

if

WORLDS of SCIENCE FICTION

JULY 1953 • 35 CENTS

\$1.00



10

JACK VANCE • WALT SHELDON • H. B. FYFE



MERCURY—the smallest, hottest and innermost planet in our system—is probable completely airless. Jagged cliffs rise thousands of feet above a surface pockmarked with volcanic craters. The men pictured are scaling one of the less formidable peaks, while their ship lies in the valley far below. A Mercurian day is of the same duration as its year—88 Earth days.



WORLDS of SCIENCE FICTION

JULY 1953

All Stories New and Complete

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on Titan, Sixth Moon of Saturn*

NOVELETTES

SJAMBAK by Jock Vance	4
BRINK OF MADNESS by Wolt Sheldon	44

SHORT STORIES

IRRESISTIBLE WEAPON by H. B. Fyfe	26
A BOTTLE OF OLD WINE by Richard O. Lewis	32
CELEBRITY by James McKimmy, Jr.	41
ONE MARTIAN AFTERNOON by Tom Leahy	75
WEAK ON SQUARE ROOTS by Russell Burton	82
THE LONELY ONES by Edward W. Ludwig	91
PROGRESS REPORT by Mark Clifton and Alex Apostalides	102
THE GUINEA PIGS by S. A. Lombina	115

FEATURES

A CHAT WITH THE EDITOR	2
PERSONALITIES IN SCIENCE	80
SCIENCE BRIEFS	89
THE POSTMAN COMETH	119

COVER PICTORIAL: Venus and Mercury

IF is published bi-monthly by Quinn Publishing Company, Inc. Volume 2, No. 3. Copyright 1953 by Quinn Publishing Co., Inc. Office of publication, 8 Lord Street, Buffalo, New York. Entered as Second Class Matter at Post Office, Buffalo, New York. Subscription \$3.50 for 12 issues in U.S. and Possessions; Canada \$4 for 12 issues; elsewhere \$4.50. Allow four weeks for change of address. All stories appearing in this magazine are fiction; any similarity to actual persons is coincidental. Not responsible for unsolicited artwork or manuscripts. 35c a copy. Printed in U.S.A.

EDITORIAL AND BUSINESS OFFICES, KINGSTON, NEW YORK

Next issue on sale July 10th



A CHAT WITH THE EDITOR

SOMETIMES a body gets to wondering just what *progress* really is. In this case, my confusion is about one of those new, super-duper fountain pens, made by one of America's oldest pen and pencil makers. The one I have in mind is right on the desk before me. It's a desk pen—a pretty thing, black, onyx-like base, magnetic marble, which holds the penholder in any position, and a slim, sleek, black pen with a chrome band around the middle. It has a truly graceful, futuristic, pace-setting feel and appearance. But, boy-oh-boy-oh-boy! That pretty thing is more trouble to fill than an old-fashioned Saturday-night-bath tub with an old oaken bucket from an old time, pulley-working dug-well.

You've no doubt had experiences with one like it. If you haven't, here's how it works: First, you gotta

have special ink for it—made by the maker of the pen. Then, you unscrew the top of the pen and find a plunger. This plunger is special. No once-down-and-release like the good old-time pens of fifteen, twenty or twenty-five years ago. This special, super plunger requires *nine* plunges, holding the point submerged all the while. And each time you "plunge", you gotta allow a couple seconds on the release for it to suck in ink. The *ninth* time, you *remove* it from the ink and *then* release the plunger. No variations, now, and no short cuts! Should you lose count because your phone rings or something, you have to start all over from scratch. You can't fool that pen!

Oh, you get used to it after a while. All you gotta do is practice. Like on Saturdays and Sundays and during your lunch hour. You gradually become quite proficient. I've had mine for two years and I'm pretty good. I average a penful of ink three out of every five times I perform the operation.

And yet, no matter how assinine I think it is, I reckon it is probably better than the old fashioned type that had a little lever or plunger, which you worked *once*—with your eyes shut and without mumbling a count and using anybody's ink—and you had a penful that would write a long time. After all, *that* was much too simple. Oh, yes, I've also got a pocket job, with a super, trick-reverse vacuum method of filling, that doesn't take in as much ink as any self-respecting wreck you use to fill out money order forms in post offices around the country. But it looks nice when I take it out of my

pocket and let it rest on the table while I borrow somebody else's equipment to write with.

IT WAS Mark Twain who once said, "Everybody complains about the weather, but nobody does anything about it". That pretty much applies to this thing we call "time". You've heard that familiar gripe: "Where the heck does the time go?" Or, "How time flies!" Or, "There ought to be more than 24 hours in a day!" Anyhow, you get the idea. But did you ever stop to think that we're putting the cart before the horse. Time ain't flying at all. *We're* flying. "Time" is an invention of our civilization. It is relative to action, movement, music, geology, mathematics, life, etc., etc. Out in space, out in the infinite, there is no time—as we know it. Let the earth change its rotation and we'd have a heck of a "time" with our clocks, calendars, sundials, egg cookers, etc. Anyhow, I suppose this thought was suggested by a line I remembered from a swell movie I saw recently. The movie was *Breaking Through the Sound Barrier*, and the scene is that of the test pilot looking through a telescope, stationed in the private observatory of a manufacturer of jet planes. After a while of intense watching, he says something to the effect that in those millions of light years out there, they are living in the past. The manufacturer, sitting nearby, hears him and looks up. There is a dreamy expression on his face. "My boy," he said, "out there is the *past*, the *present*, and the *future*."

We make our own time. So it is we who fly.

Breaking Through the Sound Barrier, incidentally, is a picture anyone interested in science, factual or fictional, will enjoy seeing. It has all the basic emotions, plus some new ones. I've been up in planes doing over 300 miles per hour, at over 20,000 feet, but that was nowhere near the thrill of watching this movie. The camera takes you through phases of man's breathless quest for speed, it gives you a look-in on the development of mighty engines, and it introduces you to a philosophical equation of man, nature and machinery. And when the camera takes you inside a plane screaming through space 40,000 feet up, hurtling life and machine against the sound barrier—well it's the next best thing to actually being up there. In fact, it's better. Personally, you couldn't get me up there with a million dollar life insurance policy. Watching it from a safe, comfortable seat in a movie house was enough for me.

INCIDENTALLY, the real *fun* of flying seems to me to be in these small personal jobs. A friend of mine has a small four-seater Stinson and the time he took me up I behaved like a three-year old on his first ride on a merry-go-round. Flying at 90 to 100 miles per hour at 500 to 1000 feet gives you the excitement of contrast. You follow roads, rivers, railroad tracks, pick out familiar landmarks; you see life below with a fascinating perspective which is never possible in the big, fast planes. Besides, to reiterate, I never am in 600-miles-per-hour worth of hurry.

—jlq





Wilbur Murphy sought romance, excitement, and an impossible Horseman of Space. With polite smiles, the planet frustrated him at every turn—until he found them all the hard way!

SJAMBAK

By Jack Vance

Illustrated by VIRGIL FINLAY

HOWARD FRAYBERG, Production Director of *Know Your Universe!*, was a man of sudden unpredictable moods; and Sam Catlin, the show's Continuity Editor, had learned to expect the worst.

"Sam," said Frayberg, "regarding the show last night. . ." He paused to seek the proper words, and Catlin relaxed. Frayberg's frame of mind was merely critical. "Sam, we're in a rut. What's worse, the show's dull!"

Sam Catlin shrugged, not committing himself.

"*Seaweed Processors of Alphard IX*—who cares about seaweed?"

"It's factual stuff," said Sam, defensive but not wanting to go too far out on a limb. "We bring 'em everything—color, fact, romance, sight, sound, smell. . . . Next week, it's the Ball Expedition to the Mix-tup Mountains on Gropus."

Frayberg leaned forward. "Sam, we're working the wrong slant on this stuff. . . . We've got to loosen

up, sock 'em! Shift our ground! Give 'em the old human angle—glamor, mystery, thrills!"

Sam Catlin curled his lips. "I got just what you want."

"Yeah? Show me."

Catlin reached into his waste basket. "I filed this just ten minutes ago. . . ." He smoothed out the pages. "Sequence idea, by Wilbur Murphy. Investigate 'Horseman of Space,' the man who rides up to meet incoming spaceships!"

Frayberg tilted his head to the side. "Rides up on a horse?"

"That's what Wilbur Murphy says."

"How far up?"

"Does it make any difference?"

"No—I guess not."

"Well, for your information, it's up ten thousand, twenty thousand miles. He waves to the pilot, takes off his hat to the passengers, then rides back down."

"And where does all this take place?"

"On—on—" Catlin frowned. "I can write it, but I can't pronounce it." He printed on his scratch-screen: CIRGAMESC.

"Sircamesk," read Frayberg.

Catlin shook his head. "That's what it looks like—but those consonants are all aspirated gutturals. It's more like 'Hrrghameshgrrh'."

"Where did Murphy get this tip?"

"I didn't bother to ask."

"Well," mused Frayberg, "we could always do a show on strange superstitions. Is Murphy around?"

"He's explaining his expense account to Shifkin."

"Get him in here; let's talk to him."

WILBUR MURPHY had a blond crew-cut, a broad freckled nose, and a serious sidelong squint. He looked from his crumpled sequence idea to Catlin and Frayberg. "Didn't like it, eh?"

"We thought the emphasis should be a little different," explained Catlin. "Instead of 'The Space Horseman,' we'd give it the working title, 'Odd Superstitions of Hrrghameshgrrh'."

"Oh, hell!" said Frayberg. "Call it Sircamesk."

"Anyway," said Catlin, "that's the angle."

"But it's not superstition," said Murphy.

"Oh, come, Wilbur. . . ."

"I got this for sheer sober-sided fact. A man rides a horse up to meet the incoming ships!"

"Where did you get this wild fable?"

"My brother-in-law is purser

on the *Celestial Traveller*. At Riker's Planet they make connection with the feeder line out of Cirgamesc."

"Wait a minute," said Catlin. "How did you pronounce that?"

"Cirgamesc. The steward on the shuttle-ship gave out this story, and my brother-in-law passed it along to me."

"Somebody's pulling somebody's leg."

"My brother-in-law wasn't, and the steward was cold sober."

"They've been eating *bhang*. Sircamesk is a Javanese planet, isn't it?"

"Javanese, Arab, Malay."

"Then they took a *bhang* supply with them, and *hashish*, *chat*, and a few other sociable herbs."

"Well, this horseman isn't any drug-dream."

"No? What is it?"

"So far as I know it's a man on a horse."

"Ten thousand miles up? In a vacuum?"

"Exactly."

"No space-suit?"

"That's the story."

Catlin and Frayberg looked at each other.

"Well, Wilbur," Catlin began.

Frayberg interrupted. "What we can use, Wilbur, is a sequence on Sircamesk superstition. Emphasis on voodoo or witchcraft—naked girls dancing—stuff with roots in Earth, but now typically Sircamesk. Lots of color. Secret rite stuff. . . ."

"Not much room on Cirgamesc for secret rites."

"It's a big planet, isn't it?"

"Not quite as big as Mars. There's no atmosphere. The settlers

live in mountain valleys, with airtight lids over 'em."

Catlin flipped the pages of *Thumbnail Sketches of the Inhabited Worlds*. "Says here there's ancient ruins millions of years old. When the atmosphere went, the population went with it."

Frayberg became animated. "There's lots of material out there! Go get it, Wilbur! Life! Sex! Excitement! Mystery!"

"Okay," said Wilbur Murphy.

"But lay off this horseman-in-space. There is a limit to public credulity, and don't you let anyone tell you different."

CIRGAMESÇ hung outside the port, twenty thousand miles ahead. The steward leaned over Wilbur Murphy's shoulder and pointed a long brown finger. "It was right out there, sir. He came riding up—"

"What kind of a man was it? Strange looking?"

"No. He was Cirgameski."

"Oh. You saw him with your own eyes, eh?"

The steward bowed, and his loose white mantle fell forward. "Exactly, sir."

"No helmet, no space-suit?"

"He wore a short Singhalût vest and pantaloons and a yellow Hadarsi hat. No more."

"And the horse?"

"Ah, the horse! There's a different matter."

"Different how?"

"I can't describe the horse. I was intent on the man."

"Did you recognize him?"

"By the brow of Lord Allah, it's

well not to look too closely when such matters occur."

"Then—you did recognize him!"

"I must be at my task, sir."

Murphy frowned in vexation at the steward's retreating back, then bent over his camera to check the tape-feed. If anything appeared now, and his eyes could see it, the two-hundred million audience of *Know Your Universe!* could see it with him.

When he looked up, Murphy made a frantic grab for the stanchion, then relaxed. Cirgamesç had taken the Great Twitch. It was an illusion, a psychological quirk. One instant the planet lay ahead; then a man winked or turned away, and when he looked back, "ahead" had become "below"; the planet had swung an astonishing ninety degrees across the sky, and they were *falling!*

Murphy leaned against the stanchion. "'The Great Twitch,'" he muttered to himself, "I'd like to get *that* on two hundred million screens!"

Several hours passed. Cirgamesç grew. The Sampan Range rose up like a dark scab; the valley sultanes of Singhalût, Hadra, New Batavia, and Boeng-Bohôt showed like glistening chicken-tracks; the Great Rift Colony of Sundeman stretched down through the foothills like the trail of a slug.

A loudspeaker voice rattled the ship. "Attention passengers for Singhalût and other points on Cirgamesç! Kindly prepare your luggage for disembarkation. Customs at Singhalût are extremely thorough. Passengers are warned to take

no weapons, drugs or explosives ashore. This is important!"

THE WARNING turned out to be an understatement. Murphy was plied with questions. He suffered search of an intimate nature. He was three-dimensionally X-rayed with a range of frequencies calculated to excite fluorescence in whatever object he might have secreted in his stomach, in a hollow bone, or under a layer of flesh.

His luggage was explored with similar minute attention, and Murphy rescued his cameras with difficulty. "What're you so damn anxious about? I don't have drugs; I don't have contraband. . . ."

"It's guns, your excellency. Guns, weapons, explosives. . . ."

"I don't have any guns."

"But these objects here?"

"They're cameras. They record pictures and sounds and smells."

The inspector seized the cases with a glittering smile of triumph. "They resemble no cameras of my experience; I fear I shall have to impound. . . ."

A young man in loose white pantaloons, a pink vest, pale green cravat and a complex black turban strolled up. The inspector made a swift obeisance, with arms spread wide. "Excellency."

The young man raised two fingers. "You may find it possible to spare Mr. Murphy any unnecessary formality."

"As your Excellency recommends. . . ." The inspector nimbly repacked Murphy's belongings, while the young man looked on benignly.

Murphy covertly inspected his face. The skin was smooth, the color of the rising moon; the eyes were narrow, dark, superficially placid. The effect was of silken punctilio with hot ruby blood close beneath.

Satisfied with the inspector's zeal, he turned to Murphy. "Allow me to introduce myself, Tuan Murphy. I am Ali-Tomás, of the House of Singhalút, and my father the Sultan begs you to accept our poor hospitality."

"Why, thank you," said Murphy. "This is a very pleasant surprise."

"If you will allow me to conduct you. . ." He turned to the inspector. "Mr. Murphy's luggage to the palace."

MURPHY accompanied Ali-Tomás into the outside light, fitting his own quick step to the prince's feline saunter. This is coming it pretty soft, he said to himself. I'll have a magnificent suite, with bowls of fruit and gin pahits, not to mention two or three silken girls with skin like rich cream bringing me towels in the shower. . . . Well, well, well, it's not so bad working for *Know Your Universe!* after all! I suppose I ought to unlimber my camera. . . .

Prince Ali-Tomás watched him with interest. "And what is the audience of *Know Your Universe!*?"

"We call 'em 'participants'."

"Expressive. And how many participants do you serve?"

"Oh, the Bowdler Index rises and falls. We've got about two hundred million screens, with five hundred million participants."

"Fascinating! And tell me—how do you record smells?"

Murphy displayed the odor recorder on the side of the camera, with its gelatinous track which fixed the molecular design.

"And the odors recreated—they are like the originals?"

"Pretty close. Never exact, but none of the participants knows the difference. Sometimes the synthetic odor is an improvement."

"Astounding!" murmured the prince.

"And sometimes. . . Well, Carson Tenlake went out to get the myrrh-blossoms on Venus. It was a hot day—as days usually are on Venus—and a long climb. When the show was run off, there was more smell of Carson than of flowers."

Prince Ali-Tomás laughed politely. "We turn through here."

They came out into a compound paved with red, green and white tiles. Beneath the valley roof was a sinuous trough, full of haze and warmth and golden light. As far in either direction as the eye could reach, the hillsides were terraced, barred in various shades of green. Spattering the valley floor were tall canvas pavilions, tents, booths, shelters.

"Naturally," said Prince Ali-Tomás, "we hope that you and your participants will enjoy Singhalút. It is a truism that, in order to import, we must export; we wish to encourage a pleasurable response to the 'Made in Singhalút' tag on our *batiks*, carvings, lacquers."

They rolled quietly across the square in a surface-car displaying the House emblem. Murphy rested against deep, cool cushions. "Your

inspectors are pretty careful about weapons."

Ali-Tomás smiled complacently. "Our existence is ordered and peaceful. You may be familiar with the concept of *adak*?"

"I don't think so."

"A word, an idea from old Earth. Every living act is ordered by ritual. But our heritage is passionate—and when unyielding *adak* stands in the way of an irresistible emotion, there is turbulence, sometimes even killing."

"An *amok*."

"Exactly. It is as well that the *amok* has no weapons other than his knife. Otherwise he would kill twenty where now he kills one."

The car rolled along a narrow avenue, scattering pedestrians to either side like the bow of a boat spreading foam. The men wore loose white pantaloons and a short open vest; the women wore only the pantaloons.

"Handsome set of people," remarked Murphy.

Ali-Tomás again smiled complacently. "I'm sure Singhalút will present an inspiring and beautiful spectacle for your program."

Murphy remembered the keynote to Howard Frayberg's instructions: "*Excitement! Sex! Mystery!*" Frayberg cared little for inspiration or beauty. "I imagine," he said casually, "that you celebrate a number of interesting festivals? Colorful dancing? Unique customs?"

Ali-Tomás shook his head. "To the contrary. We left our superstitions and ancestor-worship back on Earth. We are quiet Mohammedans and indulge in very little festivity. Perhaps here is the reason

for *amoks* and *sjambaks*.²

"*Sjambaks?*"

"We are not proud of them. You will hear sly rumor, and it is better that I arm you beforehand with truth."

"What is a *sjambak*?"

"They are bandits, flouters of authority. I will show you one presently."

"I heard," said Murphy, "of a man riding a horse up to meet the spaceships. What would account for a story like that?"

"It can have no possible basis," said Prince Ali-Tomás. "We have no horses on *Cirgamesç*. None whatever."

"But. . . ."

"The veriest idle talk. Such nonsense will have no interest for your intelligent participants."

The car rolled into a square a hundred yards on a side, lined with luxuriant banana palms. Opposite was an enormous pavilion of gold and violet silk, with a dozen peaked gables casting various changing sheens. In the center of the square a twenty-foot pole supported a cage about two feet wide, three feet long, and four feet high.

Inside this cage crouched a naked man.

The car rolled past. Prince Ali-Tomás waved an idle hand. The caged man glared down from bloodshot eyes. "That," said Ali-Tomás, "is a *sjambak*. As you see," a faint note of apology entered his voice, "we attempt to discourage them."

"What's that metal object on his chest?"

"The mark of his trade. By that you may know all *sjambaks*. In

these unsettled times only we of the House may cover our chests—all others must show themselves and declare themselves true *Singhalûsi*."

Murphy said tentatively, "I must come back here and photograph that cage."

Ali-Tomás smilingly shook his head. "I will show you our farms, our vines and orchards. Your participants will enjoy these; they have no interest in the dolor of an ignoble *sjambak*."

"Well," said Murphy, "our aim is a well-rounded production. We want to show the farmers at work, the members of the great House at their responsibilities, as well as the deserved fate of wrongdoers."

"Exactly. For every *sjambak* there are ten thousand industrious *Singhalûsi*. It follows then that only one ten-thousandth part of your film should be devoted to this infamous minority."

"About three-tenths of a second, eh?"

"No more than they deserve."

"You don't know my Production Director. His name is Howard Frayberg, and. . . ."

HOWARD FRAYBERG was deep in conference with Sam Catlin, under the influence of what Catlin called his philosophic kick. It was the phase which Catlin feared most.

"Sam," said Frayberg, "do you know the danger of this business?"

"*Ulcers*," Catlin replied promptly.

Frayberg shook his head. "We've got an occupational disease to fight --progressive mental myopia."

"Speak for yourself," said Catlin.

"Consider. We sit in this office. We think we know what kind of show we want. We send out our staff to get it. We're signing the checks, so back it comes the way we asked for it. We look at it, hear it, smell it—and pretty soon we believe it: our version of the universe, full-blown from our brains like Minerva stepping out of Zeus. You see what I mean?"

"I understand the words."

"We've got our own picture of what's going on. We ask for it, we get it. It builds up and up—and finally we're like mice in a trap built of our own ideas. We cannibalize our own brains."

"Nobody'll ever accuse you of being stingy with a metaphor."

"Sam, let's have the truth. How many times have you been off Earth?"

"I went to Mars once. And I spent a couple of weeks at Aristillus Resort on the Moon."

Frayberg leaned back in his chair as if shocked. "And we're supposed to be a couple of learned planetologists!"

Catlin made grumbling noise in his throat. "I haven't been around the zodiac, so what? You sneezed a few minutes ago and I said *gesundheit*, but I don't have any doctor's degree."

"There comes a time in a man's life," said Frayberg, "when he wants to take stock, get a new perspective."

"Relax, Howard, relax."

"In our case it means taking out our preconceived ideas, looking at them, checking our illusions against reality."

"Are you serious about this?"

"Another thing," said Frayberg, "I want to check up a little. Shifkin says the expense accounts are frightful. But he can't fight it. When Keeler says he paid ten munits for a loaf of bread on Nekkar IV, who's gonna call him on it?"

"Hell, let him eat bread! That's cheaper than making a safari around the cluster, spot-checking the super-markets."

Frayberg paid no heed. He touched a button; a three foot sphere full of glistening motes appeared. Earth was at the center, with thin red lines, the scheduled space-ship routes, radiating out in all directions.

"Let's see what kind of circle we can make," said Frayberg. "Gower's here at Canopus, Keeler's over here at Blue Moon, Wilbur Murphy's at Sirgamesk. . . ."

"Don't forget," muttered Catlin, "we got a show to put on."

"We've got material for a year," scoffed Frayberg. "Get hold of Space-Lines. We'll start with Sirgamesk, and see what Wilbur Murphy's up to."

WILBUR MURPHY was being presented to the Sultan of Singhalút by the Prince Ali-Tomás. The Sultan, a small mild man of seventy, sat crosslegged on an enormous pink and green air-cushion. "Be at your ease, Mr. Murphy. We dispense with as much protocol here as practicable." The Sultan had a dry clipped voice and the air of a rather harassed corporation executive. "I understand you represent

Earth-Central Home Screen Network?"

"I'm a staff photographer for the *Know Your Universe!* show."

"We export a great deal to Earth," mused the Sultan, "but not as much as we'd like. We're very pleased with your interest in us, and naturally we want to help you in every way possible. Tomorrow the Keeper of the Archives will present a series of charts analyzing our economy. Ali-Tomás shall personally conduct you through the fish-hatcheries. We want you to know we're doing a great job out here on Singhalút."

"I'm sure you are," said Murphy uncomfortably. "However, that isn't quite the stuff I want."

"No? Just where do your desires lie?"

Ali-Tomás said delicately. "Mr. Murphy took a rather profound interest in the sjambak displayed in the square."

"Oh. And you explained that these renegades could hold no interest for serious students of our planet?"

Murphy started to explain that clustered around two hundred million screens tuned to *Know Your Universe!* were four or five hundred million participants, the greater part of them neither serious nor students. The Sultan cut in decisively. "I will now impart something truly interesting. We Singhalúsi are making preparations to reclaim four more valleys, with an added area of six hundred thousand acres! I shall put my physiographic models at your disposal; you may use them to the fullest extent!"

"I'll be pleased for the opportunity," declared Murphy. "But tomorrow I'd like to prowl around the valley, meet your people, observe their customs, religious rites, courtships, funerals. . . ."

The Sultan pulled a sour face. "We are ditch-water dull. Festivals are celebrated quietly in the home; there is small religious fervor; courtships are consummated by family contract. I fear you will find little sensational material here in Singhalút."

"You have no temple dances?" asked Murphy. "No fire-walkers, snake-charmers—voodoo?"

The Sultan smiled patronizingly. "We came out here to Cirmunesç to escape the ancient superstitions. Our lives are calm, orderly. Even the *amoks* have practically disappeared.

"But the sjambaks—"

"Negligible."

"Well," said Murphy, "I'd like to visit some of these ancient cities."

"I advise against it," declared the Sultan. "They are shards, weathered stone. There are no inscriptions, no art. There is no stimulation in dead stone. Now. Tomorrow I will hear a report on hybrid soybean plantings in the Upper Kam District. You will want to be present."

MURPHY'S SUITE matched or even exceeded his expectation. He had four rooms and a private garden enclosed by a thicket of bamboo. His bathroom walls were slabs of glossy actinolite, inlaid with cinnabar, jade, galena,

pyrite and blue malachite, in representations of fantastic birds. His bedroom was a tent thirty feet high. Two walls were dark green fabric; a third was golden rust; the fourth opened upon the private garden.

Murphy's bed was a pink and yellow creation ten feet square, soft as cobweb, smelling of rose sandalwood. Carved black lacquer tubs held fruit; two dozen wines, liquors, syrups, essences flowed at a touch from as many ebony spigots.

The garden centered on a pool of cool water, very pleasant in the hothouse climate of Singhalút. The only shortcoming was the lack of the lovely young servitors Murphy had envisioned. He took it upon himself to repair this lack, and in a shady wine-house behind the palace, called the Barangipan, he made the acquaintance of a girl-musician named Soek Panjoebang. He found her enticing tones of quavering sweetness from the *gamelan*, an instrument well-loved in Old Bali. Soek Panjoebang had the delicate features and transparent skin of Sumatra, the supple long limbs of Arabia and in a pair of wide and golden eyes a heritage from somewhere in Celtic Europe. Murphy bought her a goblet of frozen shavings, each a different perfume, while he himself drank white rice-beer. Soek Panjoebang displayed an intense interest in the ways of Earth, and Murphy found it hard to guide the conversation. "Weelbrrr," she said. "Such a funny name, Weelbrrr. Do you think I could play the *gamelan* in the great cities, the great palaces of Earth?"

"Sure. There's no law against *gamelans*."

"You talk so funny, Weelbrrr. I like to hear you talk."

"I suppose you get kinda bored here in Singhalút?"

She shrugged. "Life is pleasant, but it concerns with little things. We have no great adventures. We grow flowers, we play the *gamelan*." She eyed him archly sidelong. "We love. . . . We sleep. . . ."

Murphy grinned. "You run *amok*."

"No, no, no. That is no more."

"Not since the sjambaks, eh?"

"The sjambaks are bad. But better than *amok*. When a man feels the knot forming around his chest, he no longer takes his kris and runs down the street—he becomes sjambak."

This was getting interesting. "Where does he go? What does he do?"

"He robs."

"Who does he rob? What does he do with his loot?"

She leaned toward him. "It is not well to talk of them."

"Why not?"

"The Sultan does not wish it. Everywhere are listeners. When one talks sjambak, the Sultan's ears rise, like the points on a cat."

"Suppose they do—what's the difference? I've got a legitimate interest. I saw one of them in that cage out there. That's torture. I want to know about it."

"He is very bad. He opened the monorail car and the air rushed out. Forty-two Singhalúsi and Hadrasi bloated and blew up."

"And what happened to the sjambak?"

"He took all the gold and money and jewels and ran away."

"Ran where?"

"Out across Great Pharasang Plain. But he was a fool. He came back to Singhalût for his wife; he was caught and set up for all people to look at, so they might tell each other, 'thus it is for sjambaks.'"

"Where do the sjambaks hide out?"

"Oh," she looked vaguely around the room, "out on the plains. In the mountains."

"They must have some shelter—an air-dome."

"No. The Sultan would send out his patrol-boat and destroy them. They roam quietly. They hide among the rocks and tend their oxygen stills. Sometimes they visit the old cities."

"I wonder," said Murphy, staring into his beer, "could it be sjambaks who ride horses up to meet the spaceship?"

Soek Panjoebang knit her black eyebrows, as if preoccupied.

"That's what brought me out here," Murphy went on. "This story of a man riding a horse out in space."

"Ridiculous; we have no horses in Cirgamesç."

"All right, the steward won't swear to the horse. Suppose the man was up there on foot or riding a bicycle. But the steward recognized the man."

"Who was this man, pray?"

"The steward clammed up. . . . The name would have been just noise to me, anyway."

"I might recognize the name. . . ."

"Ask him yourself. The ship's

still out at the field."

She shook her head slowly, holding her golden eyes on his face. "I do not care to attract the attention of either steward, sjambak—or Sultan."

Murphy said impatiently. "In any event, it's not who—but *how*. How does the man breathe? Vacuum sucks a man's lungs up out of his mouth, bursts his stomach, his ears. . . ."

"We have excellent doctors," said Soek Panjoebang shuddering, "but alas! I am not one of them."

MURPHY LOOKED at her sharply. Her voice held the plangent sweetness of her instrument, with additional overtones of mockery. "There must be some kind of invisible dome around him, holding in air," said Murphy.

"And what if there is?"

"It's something new, and if it is, I want to find out about it."

Soek smiled languidly. "You are so typical an old-lander—worried, frowning, dynamic. You should relax, cultivate *napaû*, enjoy life as we do here in Singhalût."

"What's *napaû*?"

"It's our philosophy, where we find meaning and life and beauty in every aspect of the world."

"That sjambak in the cage could do with a little less *napaû* right now."

"No doubt he is unhappy," she agreed.

"Unhappy! He's being tortured!"

"He broke the Sultan's law. His life is no longer his own. It belongs to Singhalût. If the Sultan wishes

to use it to warn other wrong-doers, the fact that the man suffers is of small interest."

"If they all wear that metal ornament, how can they hope to hide out?" He glanced at her own bare bosom.

"They appear by night—slip through the streets like ghosts. . ." She looked in turn at Murphy's loose shirt. "You will notice persons brushing up against you, feeling you," she laid her hand along his breast, "and when this happens you will know they are agents of the Sultan, because only strangers and the House may wear shirts. But now, let me sing to you—a song from the Old Land, old Java. You will not understand the tongue, but no other words so join the voice of the *gamelan*."

"THIS IS the gravy-train," said Murphy. "Instead of a garden suite with a private pool, I usually sleep in a bubble-tent, with nothing to eat but condensed food."

Soek Panjoebang flung the water out of her sleek black hair. "Perhaps, Weelbrrr, you will regret leaving Cirgamesç?"

"Well," he looked up to the transparent roof, barely visible where the sunlight collected and refracted, "I don't particularly like being shut up like a bird in an aviary. . . . Mildly claustrophobic, I guess."

After breakfast, drinking thick coffee from tiny silver cups, Murphy looked long and reflectively at Soek Panjoebang.

"What are you thinking, Weelbrrr?"

Murphy drained his coffee. "I'm

thinking that I'd better be getting to work."

"And what do you do?"

"First I'm going to shoot the palace, and you sitting here in the garden playing your *gamelan*."

"But Weelbrrr—not me!"

"You're a part of the universe, rather an interesting part. Then I'll take the square. . . ."

"And the sjambak?"

A quiet voice spoke from behind. "A visitor, Tuan Murphy."

Murphy turned his head. "Bring him in." He looked back to Soek Panjoebang. She was on her feet.

"It is necessary that I go."

"When will I see you?"

"Tonight—at the Barangipan."

THE QUIET VOICE said, "Mr. Rube Trimmer, Tuan."

Trimmer was small and middle-aged, with thin shoulders and a paunch. He carried himself with a hell-raising swagger, left over from a time twenty years gone. His skin had the waxy look of lost floridity, his tuft of white hair was coarse and thin, his eyelids hung in the off-side droop that amateur physiognomists like to associate with guile.

"I'm Resident Director of the Import-Export Bank," said Trimmer. "Heard you were here and thought I'd pay my respects."

"I suppose you don't see many strangers."

"Not too many—there's nothing much to bring 'em. Cirgamesç isn't a comfortable tourist planet. Too confined, shut in. A man with a sensitive psyche goes nuts pretty easy here."

"Naturally I wouldn't believe him. He knew I knew that he knew it. So when he said 'Sultan', I'd think he wouldn't lie simply, but that he'd lie double—that he actually was working for the Sultan."

Murphy laughed. "Suppose he told you a fourth level lie?"

"It starts to be a toss-up pretty soon," Trimmer admitted. "I don't think he gives me credit for that much subtlety. . . . What are you doing the rest of the day?"

"Taking footage. Do you know where I can find some picturesque rites? Mystical dances, human sacrifice? I've got to work up some glamor and exotic lore."

"There's this sjambak in the cage. That's about as close to the medieval as you'll find anywhere in Earth Commonwealth."

"Speaking of sjambaks. . . ."

"No time," said Trimmer. "Got to get back. Drop in at my office—right down the square from the palace."

MURPHY RETURNED to his suite. The shadowy figure of his room servant said, "His Highness the Sultan desires the Tuan's attendance in the Cascade Garden."

"Thank you," said Murphy. "As soon as I load my camera."

The Cascade Room was an open patio in front of an artificial waterfall. The Sultan was pacing back and forth, wearing dusty khaki puttees, brown plastic boots, a yellow polo shirt. He carried a twig which he used as a riding crop, slapping his boots as he walked. He turned his head as Murphy appeared,

pointed his twig at a wicker bench.

"I pray you sit down, Mr. Murphy." He paced once up and back. "How is your suite? You find it to your liking?"

"Very much so."

"Excellent," said the Sultan. "You do me honor with your presence."

Murphy waited patiently.

"I understand that you had a visitor this morning," said the Sultan.

"Yes. Mr. Trimmer."

"May I inquire the nature of the conversation?"

"It was of a personal nature," said Murphy, rather more shortly than he meant.

The Sultan nodded wistfully. "A Singhalusi would have wasted an hour telling me half-truths—distorted enough to confuse, but not sufficiently inaccurate to anger me if I had a spy-cell on him all the time."

Murphy grinned. "A Singhalusi has to live here the rest of his life."

A servant wheeled a frosted cabinet before them, placed goblets under two spigots, withdrew. The Sultan cleared his throat. "Trimmer is an excellent fellow, but unbelievably loquacious."

Murphy drew himself two inches of chilled rosy-pale liquor. The Sultan slapped his boots with the twig. "Undoubtedly he confided all my private business to you, or at least as much as I have allowed him to learn."

"Well—he spoke of your hope to increase the compass of Singhalut."

"That, my friend, is no hope; it's absolute necessity. Our population density is fifteen hundred to the

square mile. We must expand or smother. There'll be too little food to eat, too little oxygen to breathe."

Murphy suddenly came to life. "I could make that idea the theme of my feature! Singhalût Dilemma: Expand or Perish!"

"No, that would be inadvisable, inapplicable."

Murphy was not convinced. "It sounds like a natural."

The Sultan smiled. "I'll impart an item of confidential information—although Trimmer no doubt has preceded me with it." He gave his boots an irritated whack. "To expand I need funds. Funds are best secured in an atmosphere of calm and confidence. The implication of emergency would be disastrous to my aims."

"Well," said Murphy, "I see your position."

The Sultan glanced at Murphy sidelong. "Anticipating your cooperation, my Minister of Propaganda has arranged an hour's program, stressing our progressive social attitude, our prosperity and financial prospects. . . ."

"But, Sultan. . . ."

"Well?"

"I can't allow your Minister of Propaganda to use me and *Know Your Universe!* as a kind of investment brochure."

The Sultan nodded wearily. "I expected you to take that attitude. . . . Well—what do you yourself have in mind?"

"I've been looking for something to tie to," said Murphy. "I think it's going to be the dramatic contrast between the ruined cities and the new domed valleys. How the Earth settlers succeeded where the

ancient people failed to meet the challenge of the dissipating atmosphere."

"Well," the Sultan said grudgingly, "that's not too bad."

"Today I want to take some shots of the palace, the dome, the city, the paddies, groves, orchards, farms. Tomorrow I'm taking a trip out to one of the ruins."

"I see," said the Sultan. "Then you won't need my charts and statistics?"

"Well, Sultan, I could film the stuff your Propaganda Minister cooked up, and I could take it back to Earth. Howard Frayberg or Sam Catlin would tear into it, rip it apart, lard in some head-hunting, a little cannibalism and temple prostitution, and you'd never know you where watching Singhalût. You'd scream with horror, and I'd be fired."

"In that case," said the Sultan, "I will leave you to the dictates of your conscience."

HOWARD FRAYBERG looked around the gray landscape of Riker's Planet, gazed out over the roaring black Mogador Ocean. "Sam, I think there's a story out there."

Sam Catlin shivered inside his electrically heated glass overcoat. "Out on that ocean? It's full of man-eating plesiosaurs — horrible things forty feet long."

"Suppose we worked something out on the line of *Moby Dick*? *The White Monster of the Mogador Ocean*. We'd set sail in a catamaran—"

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"Naturally I wouldn't believe him. He knew I knew that he knew it. So when he said 'Sultan', I'd think he wouldn't lie simply, but that he'd lie double—that he actually was working for the Sultan."

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"Us?"

"No," said Frayberg impatiently. "Of course not us. Two or three of the staff. They'd sail out there, look over these gray and red monsters, maybe fake a fight or two, but all the time they're after the legendary white one. How's it sound?"

"I don't think we pay our men enough money."

"Wilbur Murphy might do it. He's willing to look for a man riding a horse up to meet his spaceships."

"He might draw the line at a white plesiosaur riding up to meet his catamaran."

Frayberg turned away. "Somebody's got to have ideas around here. . . ."

"We'd better head back to the space-port," said Catlin. "We got two hours to make the Sirgamesk shuttle."

WILBUR MURPHY sat in the Barangipan, watching marionettes performing to xylophone, castanet, gong and *gamelan*. The drama had its roots in proto-historic Mohenjö-Darō. It had filtered down through ancient India, medieval Burma, Malaya, across the Straits of Malacca to Sumatra and Java; from modern Java across space to Cirgamesç, five thousand years of time, two hundred light-years of space. Somewhere along the route it had met and assimilated modern technology. Magnetic beams controlled arms, legs and bodies, guided the poses and posturings. The manipulator's face, by agency of clip, wire, radio control and minuscule selsyn, projected his scowl, smile, sneer or grimace to

the peaked little face he controlled. The language was that of Old Java, which perhaps a third of the spectators understood. This portion did not include Murphy, and when the performance ended he was no wiser than at the start.

Soek Panjoebang slipped into the seat beside Murphy. She wore musician's garb: a sarong of brown, blue, and black *batik*, and a fantastic headdress of tiny silver bells. She greeted him with enthusiasm.

"Weelbrrr! I saw you watching. . . ."

"It was very interesting."

"Ah, yes." She sighed. "Weelbrrr, you take me with you back to Earth? You make me a great picturama star, please, Weelbrrr?"

"Well, I don't know about that."

"I behave very well, Weelbrrr." She nuzzled his shoulder, looked soulfully up with her shiny yellow-hazel eyes. Murphy nearly forgot the experiment he intended to perform.

"What did you do today, Weelbrrr? You look at all the pretty girls?"

"Nope. I ran footage. Got the palace, climbed the ridge up to the condensation vanes. I never knew there was so much water in the air till I saw the stream pouring off those vanes! And *hot!*"

"We have much sunlight; it makes the rice grow."

"The Sultan ought to put some of that excess light to work. There's a secret process. . . . Well, I'd better not say."

"Oh come, Weelbrrr! Tell me your secrets!"

"It's not much of a secret. Just a catalyst that separates clay into

aluminum and oxygen when sunlight shines on it."

Soek's eyebrows rose, poised in place like a seagull riding the wind. "Weelbrrr! I did not know you for a man of learning!"

"Oh, you thought I was just a bum, eh? Good enough to make picturama stars out of *gamelan* players, but no special genius. . . ."

"No, no, Weelbrrr."

"I know lots of tricks. I can take a flashlight battery, a piece of copper foil, a few transistors and bamboo tube and turn out a paralyzer gun that'll stop a man cold in his tracks. And you know how much it costs?"

"No, Weelbrrr. How much?"

"Ten cents. It wears out after two or three months, but what's the difference? I make 'em as a hobby—turn out two or three an hour."

"Weelbrrr! You're a man of marvels! Hello! We will drink!"

And Murphy settled back in the wicker chair, sipping his rice beer.

"TODAY," said Murphy, "I get into a space-suit, and ride out to the ruins in the plain. Ghata-mipol, I think they're called. Like to come?"

"No, Weelbrrr." Soek Panjoe-bang looked off into the garden, her hands busy tucking a flower into her hair. A few minutes later she said, "Why must you waste your time among the rocks? There are better things to do and see. And it might well be—dangerous." She murmured the last word off-handedly.

"Danger? From the sjambaks?"

"Yes, perhaps."

"The Sultan's giving me a guard. Twenty men with crossbows."

"The sjambaks carry shields."

"Why should they risk their lives attacking me?"

Soek Panjoebang shrugged. After a moment she rose to her feet. "Goodbye, Weelbrrr."

"Goodbye? Isn't this rather abrupt? Won't I see you tonight?"

"If so be Allah's will."

Murphy looked after the lithe swaying figure. She paused, plucked a yellow flower, looked over her shoulder. Her eyes, yellow as the flower, lucent as water-jewels, held his. Her face was utterly expressionless. She turned, tossed away the flower with a jaunty gesture, and continued, her shoulders swinging.

Murphy breathed deeply. She might have made picturama at that. . . .

One hour later he met his escort at the valley gate. They were dressed in space-suits for the plains, twenty men with sullen faces. The trip to Ghatamipol clearly was not to their liking. Murphy climbed into his own suit, checked the oxygen pressure gauge, the seal at his collar. "All ready, boys?"

No one spoke. The silence drew out. The gatekeeper, on hand to let the party out, snickered. "They're all ready, Tuan."

"Well," said Murphy. "let's go then."

Outside the gate Murphy made a second check of his equipment. No leaks in his suit. Inside pressure: 14.6. Outside pressure: zero. His twenty guards morosely inspected their crossbows and slim swords.

The white ruins of Ghatamipol lay five miles across Pharasant Plain. The horizon was clear, the sun was high, the sky was black.

Murphy's radio hummed. Someone said sharply, "Look! There it goes!" He wheeled around; his guards had halted, and were pointing. He saw a fleet something vanishing into the distance.

"Let's go," said Murphy. "There's nothing out there." "Sjambak."

"Well, there's only one of them."

"Where one walks, others follow."

"That's why the twenty of you are here."

"It is madness! Challenging the sjambaks!"

"What is gained?" another argued.

"I'll be the judge of that," said Murphy, and set off along the plain. The warriors reluctantly followed, muttering to each other over their radio intercoms.

THE ERODED city walls rose above them, occupied more and more of the sky. The platoon leader said in an angry voice, "We have gone far enough."

"You're under my orders," said Murphy. "We're going through the gate." He punched the button on his camera and passed under the monstrous portal.

The city was frailer stuff than the wall, and had succumbed to the thin storms which had raged a million years after the passing of life. Murphy marvelled at the scope of the ruins. Virgin archaeological territory! No telling what a few

weeks digging might turn up. Murphy considered his expense account. Shifkin was the obstacle.

There'd be tremendous prestige and publicity for *Know Your Universe!* if Murphy uncovered a tomb, a library, works of art. The Sultan would gladly provide diggers. They were a sturdy enough people; they could make quite a showing in a week, if they were able to put aside their superstitions, fears and dreads.

Murphy sized one of them up from the corner of his eye. He sat on a sunny slab of rock, and if he felt uneasy he concealed it quite successfully. In fact, thought Murphy, he appeared completely relaxed. Maybe the problem of securing diggers was a minor one after all...

And here was an odd sidelight on the Singhalusi character. Once clear of the valley the man openly wore his shirt, a fine loose garment of electric blue, in defiance of the Sultan's edict. Of course out here he might be cold...

Murphy felt his own skin crawling. How could he be cold? How could he be alive? Where was his space-suit? He lounged on the rock, grinning sardonically at Murphy. He wore heavy sandals, a black turban, loose breeches, the blue shirt. Nothing more.

Where were the others?

Murphy turned a feverish glance over his shoulder. A good three miles distant, bounding and leaping toward Singhalut, were twenty desperate figures. They all wore space-suits. This man here... A sjambak? A wizard? A hallucination?

THE CREATURE rose to his feet, strode springily toward Murphy. He carried a crossbow and a sword, like those of Murphy's fleet-footed guards. But he wore no space-suit. Could there be breathable traces of an atmosphere? Murphy glanced at his gauge. Outside pressure: zero.

Two other men appeared, moving with long elastic steps. Their eyes were bright, their faces flushed. They came up to Murphy, took his arm. They were solid, corporeal. They had no invisible force fields around their heads.

Murphy jerked his arm free. "Let go of me, damn it!" But they certainly couldn't hear him through the vacuum.

He glanced over his shoulder. The first man held his naked blade a foot or two behind Murphy's bulging space-suit. Murphy made no further resistance. He punched the button on his camera to automatic. It would now run for several hours, recording one hundred pictures per second, a thousand to the inch.

The sjambaks led Murphy two hundred yards to a metal door. They opened it, pushed Murphy inside, banged it shut. Murphy felt the vibration through his shoes, heard a gradually waxing hum. His gauge showed an outside pressure of 5, 10, 12, 14, 14.5. An inner door opened. Hands pulled Murphy in, unclamped his dome.

"Just what's going on here?" demanded Murphy angrily.

Prince Ali-Tomás pointed to a table. Murphy saw a flashlight battery, aluminum foil, wire, a transistor kit, metal tubing, tools, a few

other odds and ends.

"There it is," said Prince Ali-Tomás. "Get to work. Let's see one of these paralysis weapons you boast of."

"Just like that, eh?"

"Just like that."

"What do you want 'em for?"

"Does it matter?"

"I'd like to know." Murphy was conscious of his camera, recording sight, sound, odor.

"I lead an army," said Ali-Tomás, "but they march without weapons. Give me weapons! I will carry the word to Hadra, to New Batavia, to Sundaman, to Boeng-Bohôt!"

"How? Why?"

"It is enough that I will it. Again, I beg of you . . ." He indicated the table.

Murphy laughed. "I've got myself in a fine mess. Suppose I don't make this weapon for you?"

"You'll remain until you do, under increasingly difficult conditions."

"I'll be here a long time."

"If such is the case," said Ali-Tomás, "we must make our arrangements for your care on a long-term basis."

Ali made a gesture. Hands seized Murphy's shoulders. A respirator was held to his nostrils. He thought of his camera, and he could have laughed. Mystery! Excitement! Thrills! Dramatic sequence for *Know Your Universe!* Staff-man murdered by fanatics! The crime recorded on his own camera! See the blood, hear his death-rattle, smell the poison!

The vapor choked him. *What a break! What a sequence!*

"**S**IRGAMESK," said Howard Frayberg, "bigger and brighter every minute."

"It must've been just about in here," said Catlin, "that Wilbur's horseback rider appeared."

"That's right! Steward!"

"Yes, sir?"

"We're about twenty thousand miles out, aren't we?"

"About fifteen thousand, sir."

"Sidereal Cavalry! What an idea! I wonder how Wilbur's making out on his superstition angle?"

Sam Catlin, watching out the window, said in a tight voice, "Why not ask him yourself?"

"Eh?"

"Ask him for yourself! There he is—outside, riding some kind of critter. . . ."

"It's a ghost," whispered Frayberg. "A man without a spacesuit. . . . There's no such thing!"

"He sees us. . . . Look. . . ."

Murphy was staring at them, and his surprise seemed equal to their own. He waved his hand. Catlin gingerly waved back.

Said Frayberg, "That's not a horse he's riding. It's a combination ram-jet and kiddie car with stirrups!"

"He's coming aboard the ship," said Catlin. "That's the entrance port down there. . . ."

WILBUR MURPHY sat in the captain's stateroom, taking careful breaths of air.

"How are you now?" asked Frayberg.

"Fine. A little sore in the lungs."

"I shouldn't wonder," the ship's

doctor growled. "I never saw anything like it."

"How does it feel out there, Wilbur?" Catlin asked.

"It feels awful lonesome and empty. And the breath sleeping up out of your lungs, never going in—that's a funny feeling. And you miss the air blowing on your skin. I never realized it before. Air feels like—like silk, like whipped cream—it's got texture. . . ."

"But aren't you cold? Space is supposed to be absolute zero!"

"Space is nothing. It's not hot and it's not cold. When you're in the sunlight you get warm. It's better in the shade. You don't lose any heat by air convection, but radiation and sweat evaporation keep you comfortably cool."

"I still can't understand it," said Frayberg. "This Prince Ali, he's a kind of a rebel, eh?"

"I don't blame him in a way. A normal man living under those domes has to let off steam somehow. Prince Ali decided to go out crusading. I think he would have made it too—at least on Cirgamesc."

"Certainly there are many more men inside the domes. . . ."

"When it comes to fighting," said Murphy, "a sjambak can lick twenty men in spacesuits. A little nick doesn't hurt him, but a little nick bursts open a spacesuit, and the man inside comes apart."

"Well," said the Captain. "I imagine the Peace Office will send out a team to put things in order now."

Catlin asked, "What happened when you woke up from the chloroform?"

"Well, nothing very much. I felt this attachment on my chest, but didn't think much about it. Still kinda woozy. I was halfway through decompression. They keep a man there eight hours, drop pressure on him two pounds an hour, nice and slow so he don't get the bends."

"Was this the same place they took you, when you met Ali?"

"Yeah, that was their decompression chamber. They had to make a sjambak out of me; there wasn't anywhere else they could keep me. Well, pretty soon my head cleared, and I saw this apparatus stuck to my chest." He poked at the mechanism on the table. "I saw the oxygen tank, I saw the blood running through the plastic pipes—blue from me to that carburetor arrangement, red on the way back in—and I figured out the whole arrangement. Carbon dioxide still exhales up through your lungs, but the vein back to the left auricle is routed through the carburetor and supercharged with oxygen. A man doesn't need to breathe. The carburetor flushes his blood with oxygen, the decompression tank adjusts him to the lack of air-pressure. There's only one thing to look out for; that's not to touch anything with your naked flesh. If it's in the sunshine it's blazing hot; if it's in the shade it's cold enough to cut. Otherwise you're free as a bird."

"But—how did you get away?"

"I saw those little rocket-bikes, and began figuring. I couldn't go

back to Singhalût; I'd be lynched on sight as a sjambak. I couldn't fly to another planet—the bikes don't carry enough fuel.

"I knew when the ship would be coming in, so I figured I'd fly up to meet it. I told the guard I was going outside a minute, and I got on one of the rocket-bikes. There was nothing much to it."

"Well," said Frayberg, "it's a great feature, Wilbur—a great film! Maybe we can stretch it into two hours."

"There's one thing bothering me," said Catlin. "Who did the steward see up here the first time?"

Murphy shrugged. "It might have been somebody up here sky-larking. A little too much oxygen and you start cutting all kinds of capers. Or it might have been someone who decided he had enough crusading.

"There's a sjambak in a cage, right in the middle of Singhalût. Prince Ali walks past; they look at each other eye to eye. Ali smiles a little and walks on. Suppose this sjambak tried to escape to the ship. He's taken aboard, turned over to the Sultan and the Sultan makes an example of him. . . ."

"What'll the Sultan do to Ali?"

Murphy shook his head. "If I were Ali I'd disappear."

A loudspeaker turned on. "Attention all passengers. We have just passed through quarantine. Passengers may now disembark. Important: no weapons or explosives allowed on Singhalût!"

"This is where I came in," said Murphy.



There's no such thing as a weapon too horrible to use; weapons will continue to become bigger and deadlier. Like other things that can't be stopped . . .

IRRESISTIBLE WEAPON

By H. B. Fyfe

Illustrated by ED EMSH

IN THE SPECIAL observation dome of the colossal command ship just beyond Pluto, every nervous clearing of a throat rasped through the silence. Telescopes were available but most of the scientists and high officials preferred the view on the huge tele-screen.

This showed, from a distance of several million miles, one of the small moons of the frigid planet, so insignificant that it had not been discovered until man had pushed the boundaries of space exploration past the asteroids. The satellite was about to become spectacularly significant, however, as the first target of man's newest, most destructive weapon.

"I need not remind you, gentlemen," white-haired Co-ordinator Evora of Mars had said, "that if we have actually succeeded in this race against our former Centaurian

colonies, it may well prevent the imminent conflict entirely. In a few moments we shall know whether our scientists have developed a truly irresistible weapon."

Of all the officials, soldiers, and scientists present, Arnold Gibson was perhaps the least excited. For one thing, he had labored hard to make the new horror succeed and felt reasonably confident that it would. The project had been given the attention of every first class scientific mind in the Solar System; for the great fear was that the new states on the Centaurian planets might win the race of discovery and . . .

And bring a little order into this old-fashioned, inefficient fumbling toward progress, Gibson thought contemptuously. Look at them—fools for all their degrees and titles! They've stumbled on something with possibilities beyond their con-

fused powers of application.

A gasp rustled through the chamber, followed by an even more awed silence than had preceded the unbelievable, ultra-rapid action on the telescreen. Gibson permitted himself a tight smile of satisfaction.

Now my work really begins, he reflected.

A few quick steps brought him to Dr. Haas, director of the project, just before the less stunned observers surrounded that gentleman, babbling questions.

"I'll start collecting the Number Three string of recorders," he reported.

"All right, Arnold," agreed Haas. "Tell the others to get their ships out too. I'll be busy here."

Not half as busy as you will be in about a day, thought Gibson, heading for the spaceship berths.

HE HAD ARRANGED to be assigned the recording machines drifting in space at the greatest distance from the command ship. The others would assume that he needed more time to locate and retrieve the apparatus—which would give him a head start toward Alpha Centauri.

His ship was not large, but it was powerful and versatile to cope with any emergency that may have been encountered during the dangerous tests. Gibson watched his instruments carefully for signs of pursuit until he had put a few million miles between himself and the command ship. Then he eased his craft into subspace drive and relaxed his vigilance.

He returned to normal space

many "days" later in the vicinity of Alpha Centauri. They may have attempted to follow him for all he knew, but it hardly mattered by then. He broadcast the recognition signal he had been given to memorize long ago, when he had volunteered his services to the new states. Then he headed for the capital planet, Nessus. Long before reaching it, he acquired a lowering escort of warcraft, but he was permitted to land.

"Well, well, it's young Gibson!" the Chairman of Nessus greeted him, after the newcomer had passed through the exhaustive screening designed to protect the elaborate underground headquarters. "I trust you have news for us, my boy. Watch outside the door, Colonel!"

One of the ostentatiously armed guards stepped outside and closed the door as Gibson greeted the obese man sitting across the button-studded expanse of desk. The scientist was under no illusion as to the vagueness of the title "Chairman." He was facing the absolute power of the Centaurian planets—which, in a few months' time, would be the same as saying the ruler of all the human race in both systems. Gibson's file must have been available on the Chairman's desk telescreen within minutes of the reception of his recognition signal. He felt a thrill of admiration for the efficiency of the new states and their system of government.

He made it his business to report briefly and accurately, trusting that the plain facts of his feat would attract suitable recognition. They did. Chairman Diamond's sharp blue

eyes glinted out of the fat mask of his features.

"Well done, my boy!" he grunted, with a joviality he did not bother trying to make sound overly sincere. "So *they* have it! You must see our men immediately, and point out where they have gone wrong. You may leave it to me to decide *who* has gone wrong!"

ARNOLD GIBSON shivered involuntarily before reminding himself that *he* had seen the correct answer proved before his eyes. He had stood there and watched—more, he had worked with them all his adult life—and he was the last whom the muddled fools would have suspected.

The officer outside the door, Colonel Korman, was recalled and given orders to escort Gibson to the secret state laboratories. He glanced briefly at the scientist when they had been let out through the complicated system of safeguards.

"We have to go to the second moon," he said expressionlessly. "Better sleep all you can on the way. Once you're there, the Chairman will be impatient for results!"

Gibson was glad, after they had landed on the satellite, that he had taken the advice. He was led from one underground lab to another, to compare Centaurian developments with Solarian. Finally, Colonel Korman appeared to extricate him, giving curt answers to such researchers as still had questions.

"Whew! Glad you got me out!" Gibson thanked him. "They've been picking my brain for two days straight!"

"I hope you can stay awake," retorted Korman with no outward sign of sympathy. "If you think you can't, say so now. I'll have them give you another shot. The Chairman is calling on the telescreen."

Gibson straightened.

Jealous snob! he thought. *Typical military fathead, and he knows I amount to more than any little colonel now. I was smart enough to fool all the so-called brains of the Solar System.*

"I'll stay awake," he said shortly.

Chairman Diamond's shiny features appeared on the screen soon after Korman reported his charge ready.

"Speak freely," he ordered Gibson. "This beam is so tight and scrambled that no prying jackass could even tell that it is communication. Have you set us straight?"

"Yes, Your Excellency," replied Gibson. "I merely pointed out which of several methods the Solarians got to yield results. Your—our scientists were working on all possibilities, so it would have been only a matter of time."

"Which you have saved us," said Chairman Diamond. His ice-blue eyes glinted again. "I wish I could have seen the faces of Haas and Coordinator Evora, and the rest. You fooled them completely!"

Gibson glowed at the rare praise. "I dislike bragging, Your Excellency," he said, "but they *are* fools. I might very well have found the answer without them, once they had collected the data. My success shows what intelligence, well-directed after the manner of the new states

of Centauri, can accomplish against inefficiency."

The Chairman's expression, masked by the fat of his face, nevertheless approached a smile.

"So you would say that you—one of *our* sympathizers—were actually the most intelligent worker *they* had?"

He'll have his little joke, thought Gibson, and I'll let him put it over. Then, even that sour colonel will laugh with us, and the Chairman will hint about what post I'll get as a reward. I wouldn't mind being in charge—old Haas' opposite number at this end.

"I think I might indeed be permitted to boast of that much ability, Your Excellency," he answered, putting on what he hoped was an expectant smile. "Although, considering the Solarians, that is not saying much."

The little joke did not develop precisely as anticipated.

"Unfortunately," Chairman Diamond said, maintaining his smile throughout, "wisdom should never be confused with intelligence."

GIBSON WAITED, feeling his own smile stiffen as he wondered what could be going wrong. Surely, they could not doubt *his* loyalty! A hasty glance at Colonel Korman revealed no expression on the military facade affected by that gentleman.

"For if wisdom were completely synonymous with intelligence," the obese Chairman continued, relishing his exposition, "you would be a rival to myself, and consequently would be—disposed of—anyway!"

Such a tingle shot up Gibson's spine that he was sure he must have jumped.

"*Anyway?*" he repeated huskily. His mouth suddenly seemed dry.

Chairman Diamond smiled out of the telescreen, so broadly that Gibson was unpleasantly affected by the sight of his small, gleaming, white teeth.

"Put it this way," he suggested suavely. "Your highly trained mind observed, correlated, and memorized the most intricate data and mathematics, meanwhile guiding your social relations with your former colleagues so as to remain unsuspected while stealing their most cherished secret. Such a feat demonstrates ability and intelligence."

Gibson tried to lick his lips, and could not, despite the seeming fairness of the words. He sensed a pulsing undercurrent of cruelty and cynicism.

"On the other hand," the mellow voice flowed on, "having received the information, being able to use it effectively now without you, and knowing that you betrayed *once*—I shall simply discard you like an old message blank. *That* is an act of wisdom."

"Had you chosen your course more wisely," he added, "your position might be stronger."

By the time Arnold Gibson regained his voice, the Centaurian autocrat was already giving instructions to Colonel Korman. The scientist strove to interrupt, to attract the ruler's attention even momentarily.

Neither paid him any heed, until he shouted and tried frenziedly to

shove the soldier from in front of the telescreen. Korman backhanded him across the throat without looking around, with such force that Gibson staggered back and fell.

He lay, half-choking, grasping his throat with both hands until he could breathe. The colonel continued discussing his extinction without emotion.

"... so if Your Excellency agrees, I would prefer taking him back to Nessus first, for the sake of the morale factor here. Some of them are so addled now at having been caught chasing up wrong alleys that they can hardly work."

Apparently the Chairman agreed, for the screen was blank when the colonel reached down and hauled Gibson to his feet.

"Now, listen to me carefully!" he said, emphasizing his order with a ringing slap across Gibson's face. "I shall walk behind you with my blaster drawn. If you make a false move, I shall not kill you."

Gibson stared at him, holding his bleeding mouth.

"It will be much worse," Korman went on woodenly. "Imagine what it will be like to have both feet charred to the bone. You would have to crawl the rest of the way to the ship; *I* certainly would not consider carrying you!"

In a nightmarish daze, Gibson obeyed the cold directions, and walked slowly along the underground corridors of the Centaurian research laboratories. He prayed desperately that someone—anyone—might come along. *Anybody* who could possibly be used to create a diversion, or to be pushed into Korman and his deadly blaster.

The halls remained deserted, possibly by arrangement.

Maybe I'd better wait till we reach his ship, Gibson thought. I ought to be able to figure a way before we reach Nessus. I had the brains to fool Haas and...

He winced, recalling Chairman Diamond's theory of the difference between intelligence and wisdom.

The obscene swine! he screamed silently.

Colonel Korman grunted warningly, and Gibson took the indicated turn.

They entered the spaceship from an underground chamber, and Gibson learned the reason for his executioner's assurance when the latter chained him to one of the pneumatic acceleration seats. The chain was fragile in appearance, but he knew he would not be free to move until Korman so desired.

More of their insane brand of cleverness! he reflected. *That's the sort of thing they do succeed in thinking of. They're all crazy! Why did I ever...*

But he shrank from the question he feared to answer. To drag out into the open his petty, selfish reasons, shorn of the tinsel glamor of so-called "service" and "progress," would be too painful.

AFTER THE FIRST series of accelerations, he roused himself from his beaten stupor enough to note that Korman was taking a strange course for reaching Nessus. Then, entirely too close to the planet and its satellites to ensure



A grim tale of a future in which everyone is desperate to escape reality, and a hero who wants to have his wine and drink it, too.

A BOTTLE OF *Old Wine*

By Richard O. Lewis

Illustrated by KELLY FREAS

HERBERT HYREL settled himself more comfortably in his easy chair, extended his short legs further toward the fireplace, and let his eyes travel cautiously in the general direction of his wife.

She was in her chair as usual, her long legs curled up beneath her, the upper half of her face hidden in the bulk of her personalized, three-dimensional telovis. The telovis, of a stereoscopic nature, seemingly brought the performers with all their tinsel and color directly into the room of the watcher.

Hyrel had no way of seeing into the plastic affair she wore, but he guessed from the expression on the lower half of her face that she was watching one of the newer black-market sex-operas. In any event, there would be no sound, movement, or sign of life from her for the next three hours. To break the thread of the play for even a mo-

ment would ruin all the previous emotional build-up.

There had been a time when he hated her for those long and silent evenings, lonely hours during which he was completely ignored. It was different now, however, for those hours furnished him with time for an escape of his own.

His lips curled into a tight smile and his right hand fondled the unobtrusive switch beneath his trouser leg. He did not press the switch. He would wait a few minutes longer. But it was comforting to know that it was there, exhilarating to know that he could escape for a few hours by a mere flick of his finger.

He let his eyes stray to the dim light of the artificial flames in the fireplace. His hate for her was not bounded merely by those lonely hours she had forced upon him. No, it was far more encompassing.

He hated her with a deep, burning savagery that was deadly in its passion. He hated her for her money, the money she kept securely from him. He hated her for the paltry allowance she doled out to him, as if he were an irresponsible child. It was as if she were constantly reminding him in every glance and gesture, "I made a bad bargain when I married you. You wanted me, my money, everything, and had nothing to give in return except your own doltish self. You set a trap for me, baited with lies and a false front. Now you are caught in your own trap and will remain there like a mouse to eat from my hand whatever crumbs I stoop to give you."

But some day his hate would be appeased. Yes, some day soon he would kill her!

He shot a sideways glance at her, wondering if by chance she suspected . . . She hadn't moved. Her lips were pouted into a half smile; the sex-opera had probably reached one of its more pleasurable moments.

Hyrel let his eyes shift back to the fireplace again. Yes, he would kill her. Then he would claim a rightful share of her money, be rid of her debasing dominance.

HE LET THE thought run around through his head, savoring it with mental taste buds. He would not kill her tonight. No, nor the next night. He would wait, wait until he had sucked the last measure of pleasure from the thought.

It was like having a bottle of

rare old wine on a shelf where it could be viewed daily. It was like being able to pause again and again before the bottle, hold it up to the light, and say to it, "Some day, when my desire for you has reached the ultimate, I shall unstopper you quietly and sip you slowly to the last soul-satisfying drop." As long as the bottle remained there upon the shelf it was symbolic of that pleasurable moment. . . .

He snapped out of his reverie and realized he had been wasting precious moments. There would be time enough tomorrow for gloating. Tonight, there were other things to do. Pleasurable things. He remembered the girl he had met the night before, and smiled smugly. Perhaps she would be awaiting him even now. If not, there would be another one. . . .

He settled himself deeper into the chair, glanced once more at his wife, then let his head lean comfortably back against the chair's headrest. His hand upon his thigh felt the thin mesh that cloaked his body beneath his clothing like a sheer stocking. His fingers went again to the tiny switch. Again he hesitated.

Herbert Hyrel knew no more about the telporter suit he wore than he did about the radio in the corner, the TV set against the wall, or the personalized telovis his wife was wearing. You pressed one of the buttons on the radio; music came out. You pressed a button and clicked a dial on the TV; music and pictures came out. You pressed a button and made an adjustment on the telovis; three di-

imensional, emotion-colored pictures leaped into the room. You pressed a tiny switch on the telporter suit; you were whisked away to a receiving set you had previously set up in secret.

He knew that the music and the images of the performers on the TV and telovis were brought to his room by some form of electrical impulse or wave while the actual musicians and performers remained in the studio. He knew that when he pressed the switch on his thigh something within him—his ectoplasm, higher self, the thing spirits use for materialization, whatever its real name—streamed out of him along an invisible channel, leaving his body behind in the chair in a conscious but dream-like state. His other self materialized in a small cabin in a hidden nook between a highway and a river where he had installed the receiving set a month ago.

He thought once more of the girl who might be waiting for him, smiled, and pressed the switch.

THE DANK AIR of the cabin was chill to Herbert Hyrel's naked flesh. He fumbled through the darkness for the clothing he kept there, found his shorts and trousers, got hurriedly into them, then flicked on a pocket lighter and ignited a stub of candle upon the table. By the wavering light, he finished dressing in the black satin clothing, the white shirt, the flowing necktie and tam. He invoiced the contents of his billfold. Not much. And his monthly pittance was still two weeks away...

He had skimped for six months to salvage enough money from his allowance to make a down payment on the telporter suit. Since then, his expenses—monthly payments for the suit, cabin rent, costly liquor—had forced him to place his nights of escape on strict ration. He could not go on this way, he realized. Not now. Not since he had met the girl. He had to have more money. Perhaps he could not afford the luxury of leaving the wine bottle longer upon the shelf

Riverside Club, where Hyrel arrived by bus and a hundred yards of walking, was exclusive. It catered to a clientele that had but three things in common: money, a desire for utter self-abandonment, and a sales slip indicating ownership of a telporter suit. The club was of necessity expensive, for self-telportation was strictly illegal, and police protection came high.

Herbert Hyrel adjusted his white, silken mask carefully at the door and shoved his sales slip through a small aperture where it was thoroughly scanned by unseen eyes. A buzzer sounded an instant later, the lock on the door clicked, and Hyrel pushed through into the exhilarating warmth of music and laughter.

The main room was large. Hidden lights along the walls sent slow beams of red, blue, vermillion, green, yellow and pink trailing across the domed ceiling in a heterogeneous pattern. The colored beams mingled, diffused, spread, were caught up by mirrors of various tints which diffused and mingled the lights once more until the whole effect was an ever-changing panorama of softly-melting shades.

The gay and bizarre costumes of the masked revelers on the dance floor and at the tables, unearthly in themselves, were made even more so by the altering light. Music flooded the room from unseen sources. Laughter — hysterical, drunken, filled with utter abandonment—came from the dance floor, the tables, and the private booths and rooms hidden cleverly within the walls.

Hyrel pushed himself to an unoccupied table, sat down and ordered a bottle of cheap whiskey. He would have preferred champagne, but his depleted finances forbade the more discriminant taste.

When his order arrived, he poured a glass tumbler half full and consumed it eagerly while his eyes scanned the room in search of the girl. He couldn't see her in the dim swirl of color. Had she arrived? Perhaps she was wearing a different costume than she had the night before. If so, recognition might prove difficult.

He poured himself another drink, promising himself he would go in search of her when the liquor began to take effect.

A woman clad in the revealing garb of a Persian dancer threw an arm about him from behind and kissed him on the cheek through the veil which covered the lower part of her face.

"Hi, honey," she giggled into his ear. "Havin' a time?"

He reached for the white arm to pull her to him, but she eluded his grasp and reeled away into the waiting arms of a tall toreador. Hyrel gulped his whiskey and watched her nestle into the arms of

her partner and begin with him a sinuous, suggestive dance. The whiskey had begun its warming effect, and he laughed.

This was the land of the lotus eaters, the sanctuary of the escapeists, the haven of all who wished to cast off their shell of inhibition and become the thing they dreamed themselves to be. Here one could be among his own kind, an actor upon a gay stage, a gaudy butterfly metamorphosed from the slug, a knight of old.

The Persian dancing girl was probably the wife of a boorish oaf whose idea of romance was spending an evening telling his wife how he came to be a successful bank president. But she had found her means of escape. Perhaps she had pleaded a sick headache and had retired to her room. And there upon the bed now reposed her shell of reality while her inner self, the shadowy one, completely materialized, became an exotic thing from the East in this never-never land.

The man, the toreador, had probably closeted himself within his library with a set of account books and had left strict orders not to be disturbed until he had finished with them.

Both would have terrific hangovers in the morning. But that, of course, would be fully compensated for by the memories of the evening.

Hyrel chuckled. The situation struck him as being funny: the shadowy self got drunk and had a good time, and the outer husk suffered the hangover in the morning. Strange. Strange how a device such as the teleporter suit could cause the shadow of each bodily cell to leave

the body, materialize, and become a reality in its own right. And yet . . .

HE LOOKED at the heel of his left hand. There was a long, irregular scar there. It was the result of a cut he had received nearly three weeks ago when he had fallen over this very table and had rammed his hand into a sliver of broken champagne glass. Later that evening, upon re-telporting back home, the pain of the cut had remained in his hand, but there was no sign of the cut itself on the hand of his outer self. The scar was peculiar to the shadowy body only. There was something about the shadowy body that carried the hurts to the outer body, but not the scars . . .

Sudden laughter broke out near him, and he turned quickly in that direction. A group of gaily costumed revelers was standing in a semi-circle about a small mound of clothing upon the floor. It was the costume of the toreador.

Hyrel laughed, too. It had happened many times before—a costume suddenly left empty as its owner, due to a threat of discovery at home, had had to press the switch in haste to bring his shadowy self—and complete consciousness—back to his outer self in a hurry.

A waiter picked up the clothing. He would put it safely away so that the owner could claim it upon his next visit to the club. Another waiter placed a fresh bottle of whiskey on the table before Hyrel, and Hyrel paid him for it.

The whiskey, reaching his head now in surges of warm cheerfulness, was filling him with abandonment, courage, and a desire for merriment. He pushed himself up from the table, joined the merry throng, threw his arm about the Persian dancer, drew her close.

They began dancing slowly to the throbbing rhythm, dancing and holding on to each other tightly. Hyrel could feel her hot breath through her veil upon his neck, adding to the headiness of the liquor. His feeling of depression and inferiority flowed suddenly from him. Once again he was the all-conquering male.

His arm trembled as it drew her still closer to him and he began dancing directly and purposefully toward the shadows of a clump of artificial palms near one corner of the room. There was an exit to the garden behind the palms.

Half way there they passed a secluded booth from which protruded a long leg clad in black mesh stocking. Hyrel paused as he recognized that part of the costume. It was she! The girl! The one he had met so briefly the night before!

His arm slid away from the Persian dancer, took hold of the mesh-clad leg, and pulled. A female form followed the leg from the booth and fell into his arms. He held her tightly, kissed her white neck, let her perfume send his thoughts reeling.

"Been looking for me, honey?" she whispered, her voice deep and throaty.

"You know it!"

He began whisking her away to-

ward the palms. The Persian girl was pulled into the booth.

Yes, she was wearing the same costume she had worn the night before, that of a can-can dancer of the 90's. The mesh hose that encased her shapely legs were held up by flowered supporters in such a manner as to leave four inches of white leg exposed between hose top and lacy panties. Her skirt, frilled to suggest innumerable petticoats, fell away at each hip, leaving the front open to expose the full length of legs. She wore a wig of platinum hair encrusted with jewels that sparkled in the lights. Her jewel-studded mask was as white as her hair and covered the upper half of her face, except for the large almond slits for her eyes. A white purse, jewel crusted, dangled from one arm.

He stopped once before reaching the palms, drew her closer, kissed her long and ardently. Then he began pulling her on again.

She drew back when they reached the shelter of the fronds. "Champagne, first," she whispered huskily into his ear.

His heart sank. He had very little money left. Well, it might buy a cheap brand . . .

telovis and coming to his chair. He would then have to press the switch that would jerk his shadowy self back along its invisible connecting cord, jerk him back and leave but a small mound of clothes upon the chair at the table.

Deep depression laid hold of him. He would not be able to see her after tonight until he received his monthly dole two weeks hence. She wouldn't wait that long. Someone else would have her.

Unless . . .

Yes, he knew now that he was going to kill his wife as soon as the opportunity presented itself. It would be a simple matter. With the aid of the teleporter suit, he could establish an iron-clad alibi.

He took a long drink of whiskey and looked at the dancers about him. Sight of their gay costumes heightened his depression. He was wearing a cheap suit of satin, all he could afford. But some day soon he would show them! Some time soon he would be dressed as gaily . . .

"Something troubling you, honey?"

His gaze shot back to her and she blurred slightly before his eyes. "No. Nothing at all!" He summoned a sickly smile and clutched her hand in his. "Come on. Let's dance."

He drew her from the chair and into his arms. She melted toward him as if desiring to become a part of him. A tremor of excitement surged through him and threatened to turn his knees into quivering jelly. He could not make his feet conform to the flooding rhythm of the music. He half stum-

SHE SIPPED her champagne slowly and provocatively across the table from him. Her eyes sparkled behind the almond slits of her mask, caught the color changes and cast them back. She was wearing contact lenses of a garish green.

He wished she would hurry with her drink. He had horrible visions of his wife at home taking off her

bled, half pushed her along past the booths.

In the shelter of the palms he drew her savagely to him. "Let's—let's go outside." His voice was little more than a croak.

"But, honey!" She pushed herself away, her low voice maddening him. "Don't you have a private room? A girl doesn't like to be taken outside"

Her words bit into his brain like the blade of a hot knife.

No, he didn't have a private room at the club like the others. A private room for his teleporter receiver, a private room where he could take a willing guest. No! He couldn't afford it! No! No! NO! His lot was a cheap suit of satin! Cheap whiskey! Cheap champagne! A cheap shack by the river

An inarticulate cry escaped his twisted lips. He clutched her roughly to him and dragged her through the door and into the moonlight, whiskey and anger lending him brutal strength.

He pulled her through the deserted garden. *All the others had private rooms!* He pulled her to the far end, behind a clump of squat firs. His hands clawed at her. He tried to smother her mouth with kisses.

She eluded him deftly. "But, honey!" Her voice had gone deeper into her throat. "I just want to be sure about things. If you can't afford one of the private rooms—if you can't afford to show me a good time—if you can't come here real often"

The whiskey pounded and throbbed at his brain like blows

from an unseen club. His ego curled and twisted within him like a headless serpent.

"I'll have money!" he shouted, struggling to hold her. "I'll have plenty of money! After tonight!"

"Then we'll wait," she said. "We'll wait until tomorrow night."

"No!" he screamed. "You don't believe me! You're like the others! You think I'm no good! But I'll show you! I'll show all of you!"

SHE HAD GONE coldly rigid in his arms, unyielding.

Madness added to the pounding in his brain. Tears welled into his eyes.

"I'll show you! I'll kill her! Then I'll have money!" The hands clutching her shoulders shook her drunkenly. "You wait here! I'll go home and kill her now! Then I'll be back!"

"Silly boy!" Her low laughter rang hollowly in his ears. "And just who is it you are going to kill?"

"My wife!" he cried. "My wife! I'll"

A sudden sobering thought struck him. He was talking too much. And he wasn't making sense. He shouldn't be telling her this. Anyway, he couldn't get the money tonight even if he did kill his wife.

"And so you are going to kill your wife"

He blinked the tears from his eyes. His chest was heaving, his heart pounding. He looked at her shimmering form. "Y-yes," he whispered.

Her eyes glinted strangely in the light of the moon. Her handbag glinted as she opened it, and some-

thing she took from it glittered coldly in her hand.

"Fool!"

The first shot tore squarely through his heart. And while he stood staring at her, mouth agape, a second shot burned its way through his bewildered brain.

MRS. HERBERT HYREL removed the telovis from her head and laid it carefully aside. She uncoiled her long legs from beneath her, walked to her husband's chair, and stood for a long moment looking down at him, her lips drawn back in contempt. Then she bent over him and reached down his thigh until her fingers contacted the small switch.

Seconds later, a slight tremor shook Hyrel's body. His eyes snapped open, air escaped his lungs,

his lower jaw sagged inanely, and his head lolled to one side.

She stood a moment longer, watching his eyes become glazed and sightless. Then she walked to the telephone.

"Police?" she said. "This is Mrs. Herbert Hyrel. Something horrible has happened to my husband. Please come over immediately. Bring a doctor."

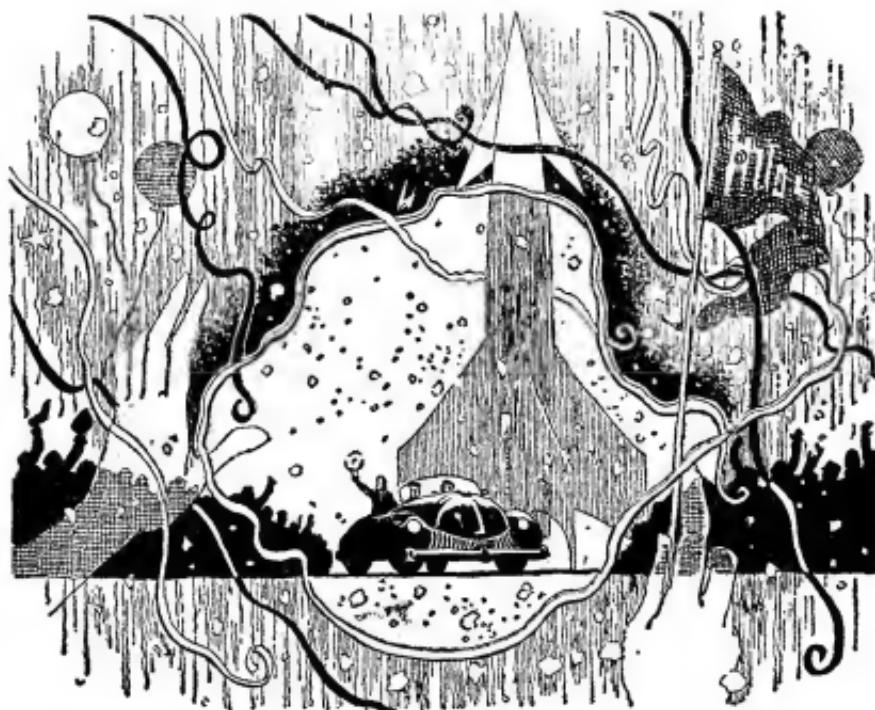
She hung up, went to her bathroom, stripped off her clothing, and slid carefully out of her teleporter suit. This she folded neatly and tucked away into the false back of the medicine cabinet. She found a fresh pair of blue, plastifur pajamas and got into them.

She was just arriving back into the living room, tying the cord of her dressing gown about her slim waist, when she heard the sound of the police siren out front.

————— THE END —————

DEPARTMENT OF SAFE PREDICTIONS

CAUTIOUSLY, modestly, and with full knowledge of the quantities of fine science fiction being published these days, we guarantee that **A CASE OF CONSCIENCE**, by James Blish, will rate as one of the best five short novels of 1953. An outstandingly complete and convincing examination of an alien planet and its civilization; a compelling portrait of a highly unusual, and unusually human, hero; a suspenseful development of a complex problem which will leave you with plenty to ponder and argue—this is the stuff of which classics are made, and it's coming in the September issue (on sale July 10). **IF** is proud of this story; you won't want to miss it!



*Sound the fanfare! Beat the drums!
Shout hosannas! Here he comes . . .*

CELEBRITY

By James McKimmy, Jr.

Illustrated by PAUL ORBAN

JUNE 19, 1978. Celebrity day. The city stretched. Empty streets glistened from the bath of a water truck. Dew-wet grass winked at the fresh peeping sun, like millions of shimmering dia-

monds. A bird chirped. Another. The city yawned.

Rows of houses lay like square ivory beads on patches of green felt. A boy drove his bicycle down the middle of an elm-bordered av-

enue, whistling loudly, while tightly rolled newspapers arced from his hand and slapped against porches.

Lights snapped on in a thousand windows, shining yellowly against the cool whiteness of dawn. Men blinked and touched beard-stubbled chins. Women moved sleepily toward porcelain and chrome kitchens.

A truck roared and garbage pails rattled. There was a smell of sour orange rinds and wet leaves and unfolding flowers. Over this came the smell of toasting bread and frying bacon.

Doors swung open, slippers feet padded across porches and hands groped for the rolled newspapers. The air was stricken with the blaring sound of transcribed music and the excited voices of commercial announcers. The doors swung shut and the sounds were muted.

A million people shifted and stretched and scratched. The sun rose above the horizon.

Celebrity day.

DOORS SLAMMED again, and half-consumed cups of coffee lay cooling behind. Children wiped at sleepy eyes and mothers swept crumbs, touching self-conscious fingers at their own bed-ruffled hair. Laborers and clerks and lawyers and doctors strode down sidewalks and climbed into automobiles and busses and sleek-nosed elevated trains. The city moved.

To the center of the city, where the tall buildings stretched to the lighting sky, came the horde, like thousands of ants toward a comb of honey. Wheels sang and whined.

Horns blasted. Whistles blew.

And waiting, strung above the wide streets between the cold marquees and the dead neon tubes, were the banners and the flags and the bunting.

The air warmed and the sun brightened. Voices chattered. Elbows nudged. Mouths smiled, teeth shone, and there was the sound of laughter, rising over the pushing throngs. The city was happy.

The bunting dipped and the banners fluttered and the flags whipped. At the edge of the city, the airport tightened itself. Waiting, waiting for the silver and blue rocket. The rocket of the Celebrity.

A large hotel, towering above the pulsing streets, began the quiver of activity. As though a great electric current had been run through its cubes and shafts and hollows, the hotel crackled. Desk clerks clicked bells and bell boys hopped. Elevators rose and fell. In the cellar, wine bottles were dusted by quick, nervous hands. In the kitchen, a towering cake was frosted and decorated. Orders cracked. Hands flew and feet chattered against tile. In one rich expansive suite a giant hoop of multi-colored flowers was placed in the center of a room.

It was in the air. Laughter, awe, worship, *excitement*!

Ropes went up and stretched between lamp posts. Blue-coated men on horses began blocking streets. Old women with wooden boxes, children with flashing eyes, men in rich suits and tattered suits began filling the sidewalks.

Curbs became lined with people. Bars threw open doors and fresh air met stale air. Men with fat

faces, thin faces, white faces, red faces, twitching with the anticipation of holiday freedom, gulped jiggers of raw whiskey and shuddered happily.

Children giggled and yelled and sprinted in crazy zig-zags. Men in white caps hustled in front of the lined curbs, shouting, carrying their boxes of ice-cream. Men with buttons, men with pennants, men with balloons joined the shouting, and the sound rose in the air and the city smiled and shifted and its heart pounded.

The hotel whirred inside itself. The airport tensed and searched the sky.

TIME MOVED and the swelling throngs jammed the sidewalks, raising their strengthening sound between the tall buildings. Windows popped open and faces beamed. Tentative showers of confetti drifted down through the air.

The city waited, its pulse thumping.

The rocket was a black point in the sky. It grew. White-suited men scattered over the landing strip. Photographers crouched. Bulbs snapped into reflectors. Cameras pointed.

The rocket landed. A door snapped open. Blue uniforms converged and flash bulbs popped. There were shouts and orders and

men running. Gates swung and there was a blue-rimmed movement to a black open car. Sirens moaned, screamed. And the black car was moving swiftly into the city.

Beneath the buildings, marching bands in red and blue and yellow uniforms stood assembled. Girls in short skirts and tasseled hats spun silver batons into the warm air. Bare legs kicked. Black boots flashed.

The crowd swayed against the ropes, and there was laughter and sweating and squinting.

The black car reached the heart of the city. Sirens died. Rows of men snapped to attention. Policemen aligned their motorcycles.

A baton shimmered high against the sun and came down.

A cymbal crashed. Drums cracked. Music blared. And there was a movement down the street.

The black car rolled along, while tape swept down from the buildings in long swirling ribbons. There was a snow of confetti. And from the throats of the people came the first roar. It grew, building, building in volume, and the city thundered its welcome to the man sitting upon the back of the open car, the small man who tipped his hat and smiled and blinked behind his glasses: Joseph S. Stettison, B.A., B.S., M.S., M.D., Ph.D., L.M. (Hon.), F.R.C.O.G.



C.I.B. Agent Pell used his head, even if he did rely on hunches more than on the computer. In fact, when the game got rough, he found that to use his head, he first had to keep it

Brink of MADNESS

By Walt Sheldon

Illustrated by KELLY FREAS

THE NIGHT the visitors came Richard Pell worked late among the great banks of criminological computers. He whistled to himself, knowing that he was way off key but not caring. Ciel, his wife, was still in his mind's eye; he'd seen her on the viewer and talked with her not ten minutes ago.

"Be home shortly, baby," he'd said, "soon as I fill in a form or two."

"All right, dear. I'll wait," she'd answered, with just the slightest tone of doubt.

It was an important night. It was at once their second anniversary and the beginning of their second honeymoon. Just how Pell—knobby, more or less homely, and easygoing—had won himself a

lovely, long-limbed blonde like Ciel was something of a mystery to many of their friends. She could hardly have married him for his money. Central Investigation Bureau agents were lucky if all their extras and bonuses brought them up to a thousand credits a year.

Pell had unquestionably caught her in a romantic moment. Maybe that was part of the trouble—part of the reason they needed this second honeymoon, this period of reacquaintance so badly. Being the wife of a C.I.B. agent meant sitting at home nine-tenths of the time while he was working on a case, and then not hearing about the case for security reasons during the one-tenth of the time he was with her.

Four times now Pell had been

ready to take his vacation; four times last minute business had come up. No more, though, by golly. Tonight he'd get out of here just as quickly as . . .

The Identifier, beyond the door, began to hum. That meant somebody was putting his hand to the opaque screen, and if the scanner recognized the fingerprints the door would open. Pell scowled at the bulky shadows outside.

"Go away, whoever you are," he muttered to himself.

Some of the other agents were out there, no doubt; they were always getting sudden inspirations late at night and returning to use the computers again. In fact, it had been tactfully suggested to Agent Richard Pell that he might use the computers a little more himself instead of relying on hunches as he so often did. "Investigation's a cold science, not a fancy art," Chief Larkin was fond of saying to the group—with his eyes on Pell.

Well, whoever it was, Pell was definitely through. No time-wasting conversation for him! He was ready for six glorious weeks of saved-up vacation time. He and Ciel, early tomorrow, would grab a rocket for one of the Moon resorts, and there they'd just loaf and relax and pay attention to each other. Try to regain whatever it was they'd had. . . .

THE DOOR opened and Chief Larkin walked in.

Chief Eustace J. Larkin was tall, in his forties, but still boyishly handsome. He dressed expensively and

well. He was dynamic and confident and he always had about him just the faintest aroma of very expensive shaving cologne. He had a Master's degree in criminology and his rise to the post of Director, C.I.B., had been sudden, dramatic and impressive. Not the least of his talents was a keen sense of public relations.

"I—uh—was on my way out," said Pell. He reached for his hat. Funny about hats: few people traveled topside anymore, and in the climate-conditioned tunnels you didn't need a hat. But C.I.B. agents had to be neat and dignified; regulations required hats and ties and cuffs and lapels. Thus, you could always spot a C.I.B. agent a mile away.

Larkin had a dimple when he smiled and Pell would bet he knew it. "We'd have called your home if we hadn't found you here. Sit down, Dick."

Pell sat glumly. For the first time, he noticed the men who had come in with the Chief. He recognized both. One was fiftyish, tall, solidly-built and well-dressed on the conservative side. His face was strong, square and oddly pale, as if someone had taken finest white marble and roughly hacked a face into it. Pell had seen that face in faxpapers often. The man was Theodor Rysland, once a wealthy corporation lawyer, now a World Government adviser in an unofficial way. Some admired him as a selfless public servant; others swore he was a power-mad tyrant. Few were indifferent.

"I'm sure you recognize Mr. Rysland," said Chief Larkin, smiling.

"And this is Dr. Walter Nebel, of the World Department of Education."

Dr. Walter Nebel was slight and had a head remarkably tiny in proportion to the rest of him. He wore cropped hair. His eyes were turtle-lidded and at first impression sleepy, and then, with a second look—wary. Pell remembered that he had won fame some time ago by discovering the electrolytic enzyme in the thought process. Pell wasn't sure exactly what this was, but the fax-papers had certainly made a fuss about it at the time.

He shook hands with the two men and then said to Larkin, "What's up?"

"Patience," said Larkin and shuffled chairs into place.

Rysland sat down solidly and gravely; Nebel perched. Rysland looked at Pell with a strong, level stare and said, "It's my sincere hope that this meeting tonight will prevent resumption of the war with Venus."

Larkin said, "Amen."

Pell stared back in some surprise. High-level stuff!

Rysland saw his stare and chuckled. "Chief Larkin tells me your sympathies are more or less Universalist. Not that it would be necessary, but it helps."

"Oh," said Pell, with mild bewilderment. The difference between the Universal and Defense parties was pretty clear-cut. The Universalists hoped to resume full relations with Venus and bring about a really secure peace through friendship and trade. It would admittedly be a tough struggle, and

the Defenders didn't think it was possible. Forget Venus, said they; fortify Earth, keep the line of demarcation on Mars, and sit tight.

"But there is, as you may know," said Rysland, "a third course in our relations with Venus."

"There is?" asked Pell. From the corner of his eye he saw Chief Larkin looking at him with an expression of—what, amusement? Yes, amusement, largely, but with a touch of contempt, too, perhaps. Hard to say.

"The third course," said Rysland, not smiling, "would be to attack Venus again, resume the war, and hope to win quickly. We know Venus is exhausted from the recent struggle. A sudden, forceful attack might possibly subjugate her. At least, that is the argument of a certain group called the Supremists."

Dr. Nebel spoke for the first time. Pell realized that the man had been watching him closely. His voice was sibilant; it seemed to drag itself through wet grass. "Also Venus is psychologically unprepared for war; the Supremists believe that, too."

Pell reached back into his memory. The Supremists. They were a minor political party—sort of a cult, too. The outfit had sprung up in the last year or so. Supremists believed that Earthmen, above all other creatures, had a destiny—were chosen—were supreme. They had several followers as delegates in World Congress. General impression: slightly crackpot.

"The Supremists," said Theodor Rysland, tapping his hard, white palm, and leaning forward, "have

been calling for attack. Aggression. Starting the war with Venus all over again. And they're not only a vociferous nuisance. They have an appeal in this business of Earthman's supremacy. They're gaining converts every day. In short, *they've now become dangerous.*"

PELL THOUGHT it over as Rysland talked. Certainly the idea of renewed war was nightmarish. He'd been in the last one: who hadn't? It had started in 2117, the year he was born, and it had dragged on for twenty-five years until T-day and the truce. The causes? Well, both Earth and Venus worked the mineral deposits on Mars unimpeded by the non-intelligent insectile life on that planet, and the original arguments had been about those mineral deposits, though there were enough for a dozen planets there. The causes were more complicated and obscure than that. Semantics, partly. There was freedom as Earthmen saw it and freedom as the Venusians saw it. Same with honor and good and evil. They were always two different things. And then Venusians had a greenish tinge to their skins and called the Earthmen, in their clicking language, "Pink-faces." And both Earthmen and Venusians hated like the devil to see the other get away with anything.

Anyway, there had been war, terrible war. Space battle, air battle, landing, repulse. Stalemate. Finally, through utter weariness perhaps, truce. Now, a taut, uneasy, suspicious peace. Communications

opened, a few art objects mutually exchanged. Immigration for a few Venusian dancers or students or diplomats. It wasn't much, but it was all in the right direction. At least Pell felt so.

Rysland was saying: "We're not sure, of course, but we suspect—we *feel*—that more than mere accident may be behind these Supremists."

"What do you mean by that?"

"Someone seeking power, perhaps. As I said, we don't know. We want to find out. Dr. Nebel has been interested for some time in the curious psychology of these Supremists—their blind, unthinking loyalty to their cause, for instance. He is, as you know, a special assistant in the Department of Education. He asked my help in arranging for an investigation, and I agreed with him wholeheartedly that one should be made."

"And I told these gentlemen," said Chief Larkin, "that I'd put a detail on it right away."

Now Pell believed he saw through it. Larkin didn't believe it was important at all; he was just obliging these Vips. A man couldn't have too many friends in World Government circles, after all. But of course Larkin couldn't afford to put one of his bright, machine-minded boys on it, and so Pell was the patsy.

"Could I remind you," said Pell, "that my vacation is supposed to start tomorrow?"

"Now, now, Dick," said Larkin, turning on the personality, "this won't take you long. Just a routine report. The computers ought to

give you all the information you need in less than a day."

"That's what you always say, every time I'm ready to take a vacation. I've been saving up for two years now"

"Dick, that's hardly the right attitude for an agent who is so close to making second grade."

Larkin had him over a barrel, there. Pell desperately wanted to make his promotion. Second-graders didn't spend their time at the control banks gathering data; they did mostly desk work and evaluation. They had a little more time to spend with their wives. He said, "Okay, okay," and got up.

"Where are you going?"

"To get my wife on the viewer and tell her I won't be home for a while after all."

He left the three of them chuckling and thought: *He jests at scars who never felt a wound.* He didn't say it aloud. You could quote formulae or scientific precepts in front of Larkin, but not Shakespeare.

HE PUNCHED OUT his home number and waited until Ciel's image swirled into the view-plate. His heart went boppety-bop as it always did. Hair of polished gold. Dark eyes, ripe olives, a little large for her face and sometimes deep and fathomless. She wore a loose, filmy nightgown and the suggestion of her body under it was enough to bring on a touch of madness in him.

"Let me say it," Ciel said. She wasn't smiling. "You won't be

home for a while. You've got another case."

"Well—yes. That's it, more or less." Pell swallowed.

"Oh, Dick."

"I'm sorry, honey. It's just that something important came up. I've got a conference on my hands. It shouldn't take more than an hour."

"And we were supposed to leave for the moon in the morning."

"Listen, baby, this is absolutely the last time. I mean it. As soon as this thing is washed up we'll *really* take that vacation. Look, I'll tell you what, I'll meet you somewhere in an hour. We'll have some fun—take in a floor show—drink a little meth. We haven't done that in a long time. How about the Stardust Cafe? I hear they've got a terrific new mentalist there."

Ciel said, "No."

"Don't be like that. We need an evening out. It'll hold us until I get this new case washed up. That won't be long, but at least we'll have a little relaxation."

Ciel said, "Well"

"Attababy. One hour. Absolutely. You just go to Station B-90, take the lift to topside and it's right on Shapley Boulevard there. You can't miss it."

"I know where it is," said Ciel. She shook her finger. "Richard Pell, so help me, if you stand me up this time"

"Baby!" he said in a tone of deep injury.

"Goodbye, Dick." She clicked off.

Pell had the feeling that even the free-flowing meth and the gaiety of the Stardust Cafe wouldn't really

help matters much. He sighed deeply as he turned and went back into the other room.

Chapter II

A LITTLE OVER an hour later he stepped from the elevator kiosk at Station B-90 and breathed the night air of topside. It was less pure actually than the carefully controlled tunnel air, but it was somehow infinitely more wonderful. At least to a sentimental primitive boob like Richard Pell, it was. Oh, he knew that it was infinitely more sensible to live and work entirely underground as people did these days—but just the same he loved the look of the black sky with the crushed diamonds of stars thrown across it and he loved the uneven breeze and the faint smell of trees and grass.

This particular topside section was given over to entertainment; all about him were theaters and cafes and picnic groves and airports for flying sports. A few hundred feet ahead he could see the three-dimensional atmospheric projection that marked the Stardust Cafe, and he could hear faintly the mournful sound of a Venusian lament being played by the askarins. He was glad they hadn't banned Venusian music, anyway, although he wouldn't be surprised if they did, some day.

That was one of the things these Supremists were trying to do. Rysland and Chief Larkin had given him a long and careful briefing on the outfit so that he could start

work tomorrow with his partner, Steve Kronski. Steve, of course, would shrug phlegmatically, swing his big shoulders toward the computer rooms and say, "Let's go to work." It would be just another assignment to him.

As a matter of fact, the job would be not without a certain amount of interest. There were a couple of puzzling things about these Supremists that Rysland had pointed out. First of all, they didn't seem to be at all organized or incorporated. No headquarters, no officers that anybody knew about. They just *were*. It was a complete mystery how a man became a Supremist, how they kept getting new members all the time. Yet you couldn't miss a Supremist whenever you met one. Before the conversation was half over he'd start spouting about the destiny of Earthmen and the general inferiority of all other creatures and so on. It sounded like hogwash to Pell. He wondered how such an attitude could survive in a scientific age.

Nor would a Supremist be essentially a moron or a neurotic; they were found in all walks of life, at all educational and emotional levels. Rysland told how he had questioned a few, trying to discover when, where and how they joined the movement. Apparently there was nothing to join, at least to hear them tell it. They just knew one day that they were Supremists, and that was the word. Rysland had shaken his head sadly and said, "Their belief is completely without logic—and maybe that's what makes it so strong. Maybe that's what frightens me about it."

OKAY, TOMORROW then Pell would tackle it. Tomorrow he'd think about it. Right now he had a date with his best girl.

He entered the cafe and the music of the askarins swirled more loudly about his head and he looked through the smoke and colored light until he spotted Ciel sitting in a rear booth. The place was crowded. On the small dance floor before the orchestra nearly nude Venusian girls were going through the writhing motions of a serpentine dance. Their greenish skins shimmered iridescently. The sad-faced Venusian musicians on the band-stand waved their graceful, spatulated fingers over their curious, boxlike askarins, producing changing tones and overtones by the altered capacitance. A rocket-man in the black and silver uniform of the Space Force was trying to stumble drunkenly out on to the floor with the dancers and his friends were holding him back. There was much laughter about the whole thing. The Venusian girls kept dancing and didn't change their flat, almost lifeless expressions.

Ciel looked up without smiling when he got to the booth. She had a half-finished glass of meth before her.

He tried a smile anyway. "Hello, baby." He sat down.

She said, "I didn't really think you'd get here. I could have had dates with exactly eleven spacemen. I kept count."

"You have been faithful to me, Cynara, in your fashion. I need a drink and don't want to wait for the waitress. Mind?" He took her half glass of meth and tossed it

down. He felt the wonderful illusion of an explosion in his skull, and it seemed to him that his body was suddenly the strongest in the world and that he could whip everybody in the joint with one arm tied behind his back. He said, "Wow."

Ciel tried a smile now. "It does that to you when you're not used to it."

The first effect passed and he felt only the warmth of the drink. He signaled a waitress and ordered a couple more. "Don't forget to remind me to take a hangover pill before I go to work in the morning," he told Ciel.

"You—you are going to work in the morning, then?"

"Afraid I can't get out of it."

"And the moon trip's off?"

"Not off, just postponed. We'll get to it, don't worry."

"Dick."

"Yes?"

"I can take it just so long, putting our vacation off and off and off." Her eyes were earnest, liquid and opaque. "I've been thinking about it. Trying to arrive at something. I'm beginning to wonder, Dick, if maybe we hadn't just better, well—call it quits, or something."

He stared at her. "Baby, what are you saying?"

AS SUDDEN, fanfare-like blast from the orchestra interrupted. They looked at the dance floor. There was a flash of light, a swirling of mist, and within the space of a second the Venusian girls suddenly disappeared and their place was taken by a tall,

hawk-nosed, dark-eyed man with a cloak slung dramatically over one shoulder. The audience applauded.

"That's Marco, the new mentalist," said Pell.

Ciel shrugged to show that she wasn't particularly impressed. Neither was Pell, to tell the truth. Mentalists were all the rage, partly because everybody could practice a little amateur telepathy and hypnotism in his own home. Mentalists, of course, made a career of it and were much better at it than anybody else.

Their drinks came and they watched Marco go through his act in a rather gloomy silence. Marco was skillful, but not especially unusual. He did the usual stuff: calling out things that people wrote on slips of paper, calling out dates on coins, and even engaging in mental duels wherein the challenger wrote a phrase, concealed it from Marco, and then deliberately tried to keep him from reading it telepathically. He had the usual hypnotism session with volunteers who were certain they could resist. He made them hop around the stage like monkeys, burn their fingers on pieces of ice, and so on. The audience roared with laughter. Pell and Ciel just kept staring.

When Marco had finished his act and the thundering applause had faded the Venusian dancing girls came back on the stage again.

Ciel yawned.

Pell said, "Me, too. Let's get out of here."

It wasn't until they were home in their underground apartment and getting ready for bed that Ciel turned to him and said, "You see?"

He was buttoning his pajamas. "See what?"

"It's *us*, Dick. It's not the floor show, or the meth, or anything—it's *us*. We can't enjoy *anything* together any more."

He said, "Now wait a minute . . ."

But she had already stepped into the bedroom and slammed the door. He heard the lock click.

"Hey," he said, "what am I supposed to do, sleep out here?"

He took the ensuing silence to mean that he was.

And he did.

THE NEXT MORNING, as he came into the office, Pell scowled deeply and went to his desk without saying good morning to anybody. Ciel had kept herself locked in the bedroom and he had made his own breakfast. How it was all going to end he didn't know. He had the feeling that she was working herself up to the decision to leave him. And the real hell of it was that he couldn't exactly blame her.

"Morning, partner," said a voice above him. He looked up. Way up. Steve Kronski was built along the general lines of a water buffalo. The usual battered grin was smeared across his face. "I see we got a new assignment."

"Oh—did Larkin brief you on it already?"

"Yeah. Before I could get my hat off. Funny set-up, all right. I punched for basic data before you got in. Hardly any."

"Maybe that means something in itself. Maybe somebody saw to it that the information never got

into the central banks."

The C.I.B. computers could be hooked into the central banks which stored information on nearly everything and everybody. If you incorporated, filed for a patent, paid taxes, voted, or just were born, the central banks had an electronic record of it.

Kronski jerked his thumb toward the computer room. "I punched for names of Supremist members couple minutes ago. Thought maybe we could start in that way."

Pell followed, his mind not really on the job yet. He wasn't at his best working with the computers, and yet operating them was ninety per cent of investigation. He supposed he'd get used to it sometime.

Three walls of the big computer room were lined with control racks, consisting mostly of keyboard set-ups. Code symbols and index cards were placed in handy positions. The C.I.B. circuits, of course, were adapted to the specialized work of investigation. In the memory banks of tubes and relays there was a master file of all names—aliases and nicknames included—with which the organization had ever been concerned. Criminals, witnesses, complaints, everyone. Code numbers linked to the names showed where data on their owner could be found. A name picked at random might show that person to have data in the suspect file, the arrest file, the psychological file, the *modus operandi* file, and so forth. Any of the data in these files could be checked, conversely, against the names.

Kronski walked over to where letter sized cards were flipping from a slot into a small bin. He said,

"Didn't even have to dial in Central Data for these. Seems we got a lot of Supremist members right in our own little collection."

Pell picked up one of the cards and examined it idly. Vertical columns were inscribed along the card, each with a heading, and with further sub-headed columns. Under the column marked *Modus Operandi*, for instance, there were sub-columns titled *Person Attacked*, *Property Attacked*, *How Attacked*, *Means of Attack*, *Object of Attack*, and *Trademark*. Columns of digits, one to nine, were under each item. If the digits 3 and 2 were punched under *Trademark* the number 32 could be fed into the Operational Data machine and this machine would then give back the information on a printed slip that number 32 stood for the trademark of leaving cigar butts at the scene of the crime.

"Got five hundred now," said Kronski. "I'll let a few more run in case we need alternates."

"Okay," said Pell. "I'll start this batch through the analyzer."

He took the cards across the room to a machine about twenty feet long and dropped them into the feeder at one end. Channels and rollers ran along the top of this machine and under them were a series of vertical slots into which the selected cards could drop. He cleared the previous setting and ran the pointer to *Constants*. He set the qualitative dial to 85%. This meant that on the first run the punch hole combinations in the cards would be scanned and any item common to 85% of the total would be registered in a relay. Up-

on the second run the machine would select the cards with this constant and drop them into a slot corresponding with that heading. Further scanning, within the slot itself, would pick out the constant number.

Pell started the rollers whirring.

Kronski came over. He rubbed his battered nose. "Hope we get outside on this case. I'm gettin' sick o' the office. Haven't been out in weeks."

Pell nodded. Oh, for the life of a C.I.B. man. In teleplays they cornered desperate criminals in the dark ruins of the ancient cities topside, and fought it out with freezers. The fact was, although regulations called for them to carry freezers in their shoulder holsters, one in a thousand ever got a chance to use them.

Pell said, "Maybe you need a vacation."

"Maybe. Only I keep putting my vacation off. Got a whole month saved up now."

"Me, too." Pell sighed. Ciel would probably be pacing the floor back home now, trying to make up her mind. To break it up, or not to break it up? There would be no difficulty, really: she had been a pretty good commercial artist before they were married and she wouldn't have any trouble finding a job again somewhere in World City.

The rollers kept whirring and the cards flipping along with a whispering sound.

"Wonder what we're looking into these Supremists for?" asked Kronski. "I always thought they

were some kind of harmless crackpots."

"The Chief doesn't think so. Neither does Theodor Rysland." He told Kronski more about the interview last night.

Presently the machine stopped, clicked several times and began rolling the other way.

"Well, it found something," said Kronski.

They kept watching. Oh, for the life of a C.I.B. man. Cards began to drop into one of the slots. The main heading was *Physical* and the sub-heading *Medical History*. Pell frowned and said, "Certainly didn't expect to find a constant in this department." He picked up a few of the first cards and looked at them, hoping to catch the constant by eye. He caught it. "What's 445 under this heading?"

KRONSKI SAID, "I'll find out," and stepped over to the Operational Data board. He worked it, took the printed slip that came out and called back: "Record of inoculation."

"That's a funny one."

"Yup. Sure is." Kronski stared at the slip and scratched his neck. "It must be just any old kind inoculation. If it was special—like typhoid or tetanus or something—it'd have another digit."

"There must be some other boil-downs, if we could think of them." Pell was frowning heavily. Some of the other men, used to the machines, could grab a boil-down out of thin air, run the cards again and get another significant constant. The machine, however, inhibited

Pell. It made him feel uneasy and stupid whenever he was around it.

"How about location?" suggested Kronski.

Pell shook his head. "I checked a few by eye. All different numbers under location. Some of 'em come from World City, some from Mars Landing, some from way out in the sticks. Nothing significant there."

"Maybe what we need is a cup of coffee."

Pell grinned. "Best idea all morning. Come on."

Some minutes later they sat across from each other at a table in the big cafeteria on the seventy-third level. It was beginning to be crowded now with personnel from other departments and bureaus. The coffee urge came for nearly everybody in the government offices at about the same time. Pell was studying by eye a handful of spare data cards he'd brought along and Kronski was reading faxpaper clippings from a large manila envelope marked *Supremist Party*. Just on a vague hunch Pell had viewplated Central Public Relations and had them send the envelope down by tube.

"Prominent Educator Addresses Supremist Rally," Kronski muttered. "Three Spaceport Cargomen Arrested at Supremist Riot. Young Supremists Form Rocket Club. Looks like anybody and everybody can be a Supremist. And his grandmother. Wonder how they do it?"

"Don't know." Pell wasn't really listening.

"And here's a whole town went over to the Supremists. On the moon."

"Uh-huh," said Pell.

Kronski sipped his coffee loudly. A few slender, graceful young men from World Commerce looked at him distastefully. "Happened just this year. New Year they all went over. Augea, in the Hercules Mountains. Big celebration."

Pell looked up and said, "Wait a minute. . . ."

"Wait for what? I'm not goin' anywhere. Not on this swivel-chair of a job, damn it."

"New Year they all become Supremists. And the last week of December everybody on the moon gets his inoculations, right?"

"Search me."

"But I know that. I found that out when I was tailing those two gamblers who had a place on the moon, remember?"

"So it may be a connection." Kronski shrugged.

"It may be the place where we can study a bunch of these cases in a batch instead of picking 'em one by one."

"You mean we oughta take a trip to the moon?"

"Might not hurt for a few days."

Kronski was grinning at him.

"What are you grinning at?"

"First you got to stay over on your vacation, so you can't go to the moon with your wife. Now all of a sudden you decide duty has got to take you to the moon, huh?"

Pell grinned back then. "What are you squawking about? You said you wanted to get out on this case."

Kronski, still grinning, got up. "I'm not complaining. I'm just demonstrating my powers of deduction, as they say in teleplays. Come on, let's go make rocket reservations."

Chapter III

THE BIG TOURIST rocket let them down at the Endymion Crater Landing, and they went through the usual immigration and customs formalities in the underground city there. They stayed in a hotel overnight, Pell and Ciel looking very much like tourists, Kronski tagging along and looking faintly out of place. In the morning—morning according to the 24 hour earth clock, that is—they took the jitney rocket to the resort town of Augea, in the Hercules Mountains. The town was really a cliff dwelling, built into the side of a great precipice with quartz windows overlooking a tremendous, stark valley.

It was hard to say just what attraction the moon had as a vacation land, and it was a matter of unfathomable taste. You either liked it, or you didn't. If you didn't, you couldn't understand what people who liked it saw in it. They couldn't quite explain. "It's so quiet. It's so vast. It's so beautiful," they'd say, but never anything clearer than that.

Augea itself was like twenty other resorts scattered throughout both the northern and southern latitudes of the moon. Except for the military posts and scientific research stations the moon had little value other than as a vacation land. People came there to rest, to look at the bizarre landscape through quartz, or occasionally to don spacesuits and go out on guided exploration trips.

Immediately after checking into their hotel Pell and Kronski got di-

rections to the office of the Resident Surgeon and prepared to go there. Ciel looked on quietly as Pell tightened the straps of his shoulder holster and checked the setting on his freezer.

Ciel said, "I knew it."

"Knew what, honey?" Pell went to the mirror to brush his hair. He wasn't sure it would materially improve the beauty of his long, knobby, faintly melancholy face, but he did it any way.

"The minute we get here you have to go out on business."

He turned, kissed her, then held and patted her hand. "That's just because I want to get it over with. Then I'll have time for you. Then we'll have lots of time together."

She melted into him suddenly. She put her arms around his neck and held him tightly. "If I didn't love you, you big lug, it wouldn't be so bad. But, Dick, I can't go on like this much longer. I just can't."

"Now, baby," he started to say.

There was a knock on the door then and he knew Kronski was ready. He broke away from her, threw a kiss and said, "Later. Later, baby."

She nodded and held her under lip in with her upper teeth.

He sighed and left.

PELL AND KRONSKI left the hotel and started walking along the winding tunnel with the side wall of quartz. On their right the huge valley, with its stark, unearthly landshapes, stretched away. It was near the end of the daylight period and the shadows from the distant peaks, across the valley, were long

and deep. Some of them, with little reflected light, seemed to be patches of nothingness. Pell fancied he could step through them into another dimension.

All about them, even here in the side of the mountain, and behind the thick quartz, there was the odd, utterly dead silence of the moon.

Their footsteps echoed sparsely in the corridor.

Pell said to Kronski, "Got the story all straight?"

"Like as if it was true."

"Remember the signal?"

"Sure. Soon as you say we're out of cigarettes. What's the matter, you think I'm a moron, I can't remember?"

Pell laughed and clapped him on the shoulder blade.

Minutes later they turned in from the corridor, went through another, shorter passageway and then came to a door marked: Resident Surgeon. They knocked and a deep voice boomed: "Come in!"

It was a medium-sized room, clearly a dispensary. There was an operating table, a sterilizer, tall glass-fronted instrument cabinets and a refrigerator. At the far end of the room a hulking, bear-like man sat behind a magnaloy desk. The nameplate on the desk said: Hal H. Wilcox, M.D.

"Howdy, gents," said Dr. Hal H. Wilcox, shattering the moon-silence with a vengeance. "What can I do for you?" he was all smiles.

That smile, decided Pell, didn't quite match the shrewdness of his eyes. Have to watch this boy, maybe. There was a big quartz window behind the man so that for the moment Pell saw him almost in sil-

houette. "We're from *Current* magazine," said Pell. "I'm Dick Pell and this is Steve Kronski. You got our radio, I guess."

"Oh, yes. Yes, indeed." Wilcox creaked way back in his chair. "You're the fellas want to do a story on us moon surgeons."

"That's right." Pell fumbled a little self-consciously with the gravity weights clipped to his trousers. Took a while for moon visitors to get used to them, everybody said.

"Well, I don't know exactly as how there's much of a story in what we do. We're just a bunch of saw-bones stationed here, that's all."

"We're interested in the diseases peculiar to the moon," said Pell. "For instance, why do the permanent residents up here have to have an inoculation every year?"

"That's for the Venusian rash. Thought everybody knew that."

"Venusian rash?"

"Nearest thing we ever had to it on Earth was Rocky Mountain Spotted Fever. It's a rickettsia disease. Makes a fella pretty sick; sometimes kills him in two, three days. It started when they had those Venusian construction workers and tunnel men here, oh, long before the war. Under certain conditions the rickettsia stays dormant and then pops up again."

"And the inoculation's for that?"

"Standard. Once a year. You got the inoculation yourself, no doubt, before you jumped off for the moon."

"Where does the serum or whatever you call it come from?"

Pell thought he saw Wilcox's eyes flicker. The doctor said, "It's stored at the main landings. We

draw it as we need it from there."

"Have any here now?"

Wilcox's eyes did move this time. He looked at the refrigerator—but only for the veriest moment. "Don't really reckon so," he said finally. He was staring blankly at Pell again.

Pell patted his pockets, turned to Kronski and said, "You know, I think we're out of cigarettes." Before Kronski could answer he moved to the big quartz window behind Wilcox's desk. He gazed at the moonscape. "Just can't get over how big and quiet it is," he said.

Wilcox turned and gazed with him.

Kronski drew his freezor. He pointed it, squeezed, and there was a soft, momentary buzzing and a twinkling of violet sparks at the muzzle of the weapon.

Wilcox sat where he was, frozen, knowing nothing.

PELL TURNED FAST. "Come on, Steve. Let's get it." They both stepped to the refrigerator.

They had only seconds; Kronski's weapon had been set at a low reading. The time of paralysis varied with the individual and Doc Wilcox looked husky enough not to stay frozen very long. If Pell and Kronski returned to their original positions after he came out of it he would never know that anything had happened.

Far back on a lower shelf of the refrigerator were a dozen small bottles of the same type. Pell grabbed one, glanced at the label, nodded, and dropped it into his

pocket. They took their places again.

A few moments later Wilcox moved slightly and said, "Yup. Moon's a funny place all right. You either like it or you don't."

The rest of the conversation was fairly uninspired. Pell didn't want to walk out too quickly, and had to keep up the pretense of interviewing Wilcox for a magazine story. It wasn't easy. They excused themselves finally, saying they'd be back for more information as soon as they made up some notes and got the overall picture—whatever that meant. Wilcox seemed satisfied with it.

They hurried back along the tunnel, descended to another level and found the Augea Post Office. They showed the postmaster their C.I.B. shields and identification cards and arranged for quick and special handling for the bottle of vaccine. Pell marked it *Attention, Lab*, and it was scheduled to take a quick rocket to the Endymion landing and the next unmanned mail rocket back to World City.

Pell stayed at the Post Office to make out a quick report on the incident so he wouldn't have to bore Ciel by doing it in the room, and Kronski sauntered on back to the hotel.

There was a fax receiver there and Pell, missing the hourly voice bulletins of World City Underground, checked it for news. The pages were coming out in a long tongue. He looked at the first headline:

VENUSIAN OBSERVERS ADMITTED TO WORLD CONGRESS

Well, that was a step in the right direction. Maybe one of these days they'd get around to a Solar Congress, as they ought to. The recent open war with Venus had taught both Earthmen and Venusians a lot about space travel, and it was probably possible to explore the solar system further right now. No one had yet gone beyond the asteroids. Recent observations from the telescope stations here on the moon had found what seemed to be geometrical markings on some of Jupiter's satellites. Life there? Could be. Candidates for a brotherhood of the zodiac—if both Terrans and Venusians could get the concept of brotherhood pounded through their still partially savage skulls.

Another headline:

'WE CAN LICK UNIVERSE' —WAR SEC

Not so good, that. Loose talk. Actually it was an Undersecretary of War who had said it. Pell ran over the rest of the article quickly and came to what seemed to him a significant excerpt. *"Certain patriotic groups in the world today are ready and willing to make the necessary sacrifices to get it over with. There is a fundamental difference between Earthmen and other creatures of the system, and this difference can be resolved only by the dominance of one over the other."*

Supremist stuff. Strictly. If this Undersecretary were not actually a member he was at least a supporter of the Supremist line. And that line had an appeal for the unthinking, Pell had to admit. It was pleasant

to convince yourself that you were a superior specimen, that you were chosen. . . .

VENUSIAN SPY SUSPECTS HELD ON MARS

Pell frowned deeply at that one and read the story. A couple of Venusian miners on Mars had wandered too close to one of the Earth military outposts, and had been nabbed. He doubted that they were spies; he doubted that the authorities holding them thought so. But it seemed to make a better story with a slight scare angle. He thought about how Mars was divided at an arbitrary meridian—half to Venus, half to Earth. The division solved nothing, pleased nobody. Joe Citizen, the man in the tunnels could see these things, why couldn't these so-called trained diplomats?

Pell finished his report, questioned the Postmaster a little on routine facts concerning the town, and went back to the hotel.

CIEL WAS WAITING for him. She was in a smart, frontless frock of silvery-cloth. Her golden hair shone. Her large, dark eyes looked deep, moist, alive. She looked at him questioningly and he read the silent question: *Now can you spare a little time?*

"Baby," he said softly, and kissed her.

"Mm," he said when he had finished kissing her.

The voice-phone rang.

He said, "Damn it."

It was Kronski, in his own room

next door. "Did Wilcox leave yet?" he asked.

"Wilcox?"

"Yeah. The Doc. Is he still there?"

"I didn't know he was here at all."

Kronski said, "Huh?"

Pell said, "Maybe we better back up and start all over again."

"Wilcox, the Resident Surgeon Doc Wilcox," said Kronski, not too patiently. "He was in my room a little while ago. Said he'd drop by on his way out and see if you were in."

Pell glanced at Ciel. She was busy lighting a cigarette at the other end of the room. Or pretending to be busy. Pell said, "I just got here. Just this minute. I didn't see any Wilcox. What'd he want?"

"I don't know exactly. He was kind of vague about it. Wanted to know if he could answer any more questions for us, or anything like that."

"Sounds screwy."

"Yeah. It sure does, now that I think it over."

"Let me call you back," said Pell and hung up. He turned to Ciel. "Was Doc Wilcox here?"

"Why, yes. He stopped in." Nothing but blank innocence on her face.

"Why didn't you tell me?"

"Hm?" She raised her eyebrows. "He just stopped in to see if you were here, that was all. I told him you weren't and he went out again."

"But you didn't mention it."

"Well, why should I?"

"I don't know. I'd think you'd say something about it."

"Now, listen, Dick—I'm not some suspect you're grilling. What's the matter with you, anyway?"

"It just strikes me as funny that Wilcox should drop in here and you shouldn't say one word about it, that's all."

"Well, I like that." She folded her arms. "You're getting to be so much of a cop you're starting to be suspicious of your own wife."

"Now, you know it's not that at all."

"What else is it? Dick, I'm sick of it. I'm sick of this whole stupid business you're in. The first time we get a few minutes alone together you start giving me the third degree. I won't stand for it, that's all!"

"Now, baby," he said and took a step toward her.

The deeper tone of the viewer sounded.

"**A**GH, FOR PETE'S sake," he said disgustedly and answered the call. The image of Chief Larkin's boyishly handsome face came into focus on the screen. Pell lifted a surprised eyebrow and said, "Oh, hello, Chief."

Larkin's eye was cold. Especially cold in the setting of that boyish face. "What in hell," he asked, "are you and Kronski doing on the moon?"

"Hm?" Now it was Pell's turn to look innocent. "Why, you know what we're doing, Chief. We're investigating that case. You know the one—I don't want to mention it over the viewer."

"Who the devil authorized you

to go traipsing to the moon to do it?"

"Why, nobody authorized us. I thought—I mean, when you're working on a case and you have a lead, you're supposed to go after it, aren't you?"

"Yes, but not when it's a crazy wild goose chase." In the viewer Pell saw the Chief slam his desk with the palm of his hand. "I'd like to know what in blazes you think you can do on the moon that you can't do in a good healthy session at the computers?"

"Well, that's kind of hard to explain over the viewer. We have made some progress, though. I just sent you a report on it."

Larkin narrowed one eye. "Pell, who do you think you're fooling?"

"Fooling?"

"You heard me. I know damn well you wanted to take a vacation on the moon. But we have a little job for you that holds you up, and what do you do? The next best thing, eh? You see to it that the job takes you to the moon."

"Now, Chief, it wasn't that at all . . ."

"The devil it wasn't. Now, listen to me, Pell. You pack your bags and get right back to World City. The next rocket you can get. You understand?"

Before he answered the question he looked at Ciel. She was staring at him quietly. Again he could read something of what was in her mind. He knew well enough that she was trying to say to him: *"Make a clean break now. Tell him No, you won't come back. Quit. Now's the time to do it—unless you want that stupid job of yours more than you*

want me . . ."

Pell sighed deeply, slowly looked into the viewer again and said, "Kronski and I'll be back on the next rocket, Chief."

Chapter IV

BACK AGAIN in the underground offices of C.I.B., Agent Richard Pell plunged into his job. Up to his neck. It was the only way he could keep from brooding about Ciel. She was somewhere in the city at this very moment and if he really wanted to take the trouble he'd be able to find her easily enough—but he didn't want it to happen that way. She'd never really be his again unless *she* came to *him* . . .

And so once more he found himself in the office late at night. Alone. Poring over the lab reports that had come in that afternoon, turning them over in his mind and hoping, he supposed, for a nice intuitive flash, free of charge.

As a matter of fact the analysis of the vaccine he'd lifted from Wilcox's dispensary was not without significance. There was definitely an extraneous substance. The only question was just what this substance might be. Take a little longer to find that out, the report said.

It made Pell think of the corny sign World Government officials always had on their desks, the one about doing the difficult right away and taking a little longer for the impossible. Some day, when he was a big-shot, he would have a sign on his desk saying: *Why make things*

difficult when with even less effort you can make them impossible? Of course, ideas like that were probably the very reason he'd never be a big-shot

The Identifier humming. Someone coming again.

He looked up, and then had the curious feeling of being jerked back in time to several nights ago. Chief Larkin and Theodor Rysland entered.

"Hello, Dick," said Larkin, with a touch of studied democracy. He glanced at the government adviser as if to say: *See? Knew we'd find him here.*

Pell made a sour face. "Some day I'm going to stop giving all this free overtime. Some day I'm not going to show up at all."

Rysland smiled, dislodging some of the rock strata of his curiously pale face. He seemed a little weary this evening. He moved slowly and with even more than his usual dignity. He said, "I hope, Mr. Pell, that you'll wait at least until you finish this job for us. I understand you've made some progress."

Pell shrugged and gestured at the lab report. "Progress, maybe—but I don't know how far. Just a bunch of new puzzles to be perfectly frank."

Rysland sat down at the other desk and drummed on it with his fingertips. He looked at Pell gravely. "As a matter of fact, since we last talked to you the situation has become even more urgent. A Supremist congressman introduced a bill today before the world delegates which may prove very dangerous. Perhaps you know the one I refer to."

"I was too busy to follow the news today," said Pell, looking meaningfully at Larkin.

Larkin didn't seem to notice.

Rysland said, "I'll brief you then. The bill purports to prohibit material aid of any kind to a non-Terran government. That means both credit and goods. And since the only real non-Terran government we know is Venus, it's obviously directed specifically at the Venusians."

Pell thought it over. High level stuff again. He nodded to show he followed.

"On the surface," continued Rysland, "this would seem to be a sort of anti-espionage bill. Actually, it's a deliberately provocative act. I know the Venusians will take it that way. But right now certain quarters are secretly trying to negotiate a trade treaty with Venus which would be a major step toward peaceful relations. If this bill became law, such a treaty would be impossible."

"But World Congress isn't likely to pass such a bill, is it? Won't they see through it?"

Rysland frowned. "That's what we're not sure of. Messages are pouring in urging passage—all of them from Supremists, of course. The Supremists are relatively few, but they make a lot of noise. Sometimes noise like that is effective. It could swing a lot of delegates who don't see the real danger of this bill and are at the moment undecided. The Defender side, with its desire to isolate and fortify, is especially susceptible."

"That is bad," said Pell thoughtfully.

RYSLAND PUT his palm on the desk. "Now then, if we can somehow discredit the Supremists—get to the bottom of this thing quickly enough—I'm sure that bill will be killed. I came here tonight, I suppose, out of pure anxiety. In other words, Mr. Pell, just how far are you?"

Pell smiled and shook his head. "Not very, I'm afraid. This Supremist thing is the damndest I ever came across. No central headquarters, no officers, no propaganda mill—entirely word of mouth as far as I can see. No way of finding out how it started, or even how the new members are proselyted. Ask any member how he became a Supremist. He just looks kind of dreamy and mutters something about the truth suddenly dawning upon him one day."

"But don't you have any theories?"

"I've got a hunch," Pell said, picking up the lab report.

Chief Larkin snorted softly. The snort said clearly enough that an efficient investigator didn't depend on hunches these days: he went after something doggedly on the computer, or by other approved techniques.

Pell pretended not to hear the snort. "First of all we discovered that nearly all Supremists received some kind of an inoculation before they became Supremists. Then we found a whole village, one of those moon resort towns, that had gone over. There was the record of inoculation there, too. I got hold of some of the vaccine and had the lab analyze it. It's mostly vaccine all right, but there is a foreign sub-

stance in it. Listen." He read from the report: "*Isolated point oh six four seven grams unclassified crystal compound, apparently form of nucleotide enzyme. Further analysis necessary.*"

"You think this enzyme, or whatever it is, has something to do with it?"

"I don't know. All I have is a pretty wild theory. To begin, when our lab can't analyze something right away, it's pretty rare—possibly even unknown to chemistry in general. Now it's just possible that this substance does something to the brain that makes a man into a Supremist, and that somebody's behind the whole thing, deliberately planting the stuff so that people here and there become injected with it."

"Pell." Larkin made a pained face. "Really."

Pell shrugged. "Well, as I say, it's a hunch, that's all."

"It's a pipe dream," said Larkin. "I never heard of anything so fantastic."

"That's what folks said a couple of centuries ago when the Venusians were first trying to make contact and their ships were sighted all over the place. 'I never heard of anything so fantastic,' they all said."

Theodor Rysland still looked interested. "Granted there is some connection between the Supremist mental state and this, er, enzyme. What then, Mr. Pell?"

"Well," said Pell, stretching his legs out, "I had an idea maybe your friend Dr. Nebel could give us some help on that."

"Nebel?"

"He's interested in this thing, isn't he?"

"Definitely. Nebel's a very public spirited man."

"Well, I understand he's one of the top psychobiologists in the country today. Seems to me this new enzyme, whatever it is, would be right up his alley. Of course the lab should get to it eventually, but he might do it a lot quicker."

Larkin had been examining some statistical crime charts on the wall. He turned from them. "Pell, does Kronski know about all these wild hunches of yours?"

"I haven't talked with him about them yet. He left today before the lab report came in. Why?"

"I was just wondering," said Larkin evenly, "whether I had two maniacs in my organization or only one."

Rysland, frowning, turned to the chief. "I wouldn't be hasty, Larkin," he said. "Crazy as it sounds Pell may have something here."

Larkin snorted again, and this time along with it he shook his head sadly.

"What's your next move then?" Rysland asked Pell.

"Tomorrow morning, first thing," Pell said, "I'll take a sample of this stuff to Dr. Nebel and see what he can do with it. Of course the lab can keep on working on it in the meantime."

"Don't you think you might do better to get busy on those computers?" Larkin asked.

Pell shook his head. "This hunch is too strong, Chief."

Rysland smiled, and got up. "I'm inclined to put a little stock into this man's hunches. He's done

pretty well with them so far. I'd even say he's pretty close to a solution of this thing—possibly."

Larkin shrugged and started to look at the crime charts again.

Rysland held out his hand. "Good night, Mr. Pell. You've encouraged me. Larkin and I are going topside for a little night cap before we turn in. Like to join us?"

"No, thanks," said Pell. "I'm sleepy. I want to get home and hit that sack."

"Very well. Good night again." The two men went toward the door.

Pell watched them quietly. He had lied. He wasn't sleepy at all. He just wanted to get home and sit by that viewer and hope, hope against hope, that it would ring and that Ciel's lovely image would swirl into view....

ON THE WAY home he was just the least bit tempted to go topside, however. He thought he might like to walk the broad, quiet boulevards under the stars. His brain functioned better there. The tunnels were so clean and bright and sterile, so wonderfully functional and sensible, that they oppressed him somehow. Maybe, he sometimes thought, he wasn't fit for this age. Maybe he should have been born a couple of hundred years ago. But common sense told him that people in *that* age must have often thought exactly the same thing to themselves.

He looked at his chrono and decided he had better go home.

The apartment, when he came to it, was cold and empty without

Ciel. He bathed and tried to keep up his spirits by singing in his tuneless way, but it didn't help.

He went back into the living room, selected a film from the library and slipped it into a lap projector. He sat down and tried to concentrate on the film, a historical adventure about the days of the first moon rockets. He couldn't follow it.

The viewer rang.

He bounded from the chair as though he had triggered a high speed ejection seat in a burning jet. He went to the viewer and flicked it on. The plate shimmered, and then Ciel's image came into focus.

"*Baby!*" He was certain his shout overmodulated every amp tube in the entire World City viewer system. But he felt better, wonderfully better, already.

She was smiling. "Hello, Dick."

"Hello."

And then they looked at each other in affectionate embarrassment for a moment.

"One of us," said Pell, "ought to have his script writer along."

"Dick, I don't know exactly how to say what I want to say"

"Don't. Don't say anything. Just pretend nothing ever happened. Just come on home fast as you can."

"No, Dick. Not yet. I still want to talk about—well, everything. Dick, we've got to reach some sort of compromise. There *must* be a way."

"Come on home. We'll find a way."

"Not home. Too many memories there. Besides," she smiled a little, "I don't trust us alone together. You

know what would happen. We wouldn't get *any* talking done. Not any sensible talking anyway. You'd better meet me someplace."

He sighed. "Okay. Where can I meet you?"

"How about the Stardust Cafe?"

"Again? That place didn't help us much the last time."

"I know, but it's the handiest. I'm sure we can find a quiet place. Out on the terrace or something."

"Is there a terrace?"

"Yes, I think so. I'm sure there must be."

He looked at his chrono. "All right, baby. Half an hour?"

"Half an hour."

When she clicked off he felt his heart pounding. He felt dizzy. He felt as though he had just taken a quart of meth at one jolt—intravenously. He sang, more loudly and more off-key than ever. He went into the bedroom and started to get dressed again.

It wasn't until he was finishing the knot in his tie that the hunch hit him.

IT WAS FUNNY about that hunch. He would have said it came out of nowhere, and yet it must have broken from the bottom of his mind through some kind of restraining layer into the conscious levels. He didn't remember thinking anything that might have brought it on—his mind was strictly on Ciel. Maybe that was how it came through, with the attention of his conscious mind directed elsewhere.

With the hunch he heard Ciel's voice again, heard it very clearly,

saying: "*I'm sure we can find a quiet place. Out on the terrace or something.*" And with that other things started to fall into place.

As he thought, and as the possibilities of his hunch fanned out to embrace other possibilities he became suddenly cold and sick inside. He fought the feeling. "Got to go through with it," he muttered to himself. "Got to."

As soon as he was dressed he took the tunnel cars to Station D-90, changing twice. People were aboard at this hour, returning from the evening. Lots of men and women in uniform: the green of the landfighters, the white of the seamen, the blue of the flyers, the silver and black of the space force. Young people. Kids mostly: kids who had never seen war, smelled death, heard the wounded scream. He hoped they never would. But if his hunch was correct they might be dangerously near to it right now.

If only he had time to call Kronski. He'd feel a lot safer . . .

He shook himself. Have to stop thinking about it. Proceed cautiously now, and take each thing as it came. That was the only thing to do.

He went topside and stepped from the elevator kiosk into the night air. Ahead he saw the bright globular sign of the Stardust Cafe. But he didn't go toward it right away. He turned in the other direction, walked swiftly, and kept a sharp eye on the shadows. He turned off on a side street, circled a small park, and then crossed a sloping lawn toward the back of the night club. He headed for the light of the service entrance.

A half-credit bill got him inside through the back entrance. He found the door with the temporary sign saying: Marco the Mentalist. He knocked.

Marco the Mentalist opened the door. He didn't look quite as tall face-to-face as he did out on the floor, nor quite as impressive. His face was still dark and faintly sanguine, but the jowls seemed a little puffier now, there was a faint network of capillaries around his nostrils and his eyes looked just the least bit *vey* and tired. In a pleasant *ugh* voice he said, "Yes?"

Pell showed his C.I.B. identification.

Marco raised his eyebrows a little and said, "Come inside, please." Inside he found a chair for Pell. He sat across from him at his dressing table, half-turned toward the room. "I must get ready for my show in a little while. You understand that, of course."

Pell nodded. "What's on my mind won't take long. First of all, I want to ask a few questions about hypnotism. They may seem silly to you, or maybe a little elementary, but I'd like you to answer 'em just the same."

Marco's eyebrows went a little bit higher and he said, "Proceed."

"Okay. Question number one: can anybody be hypnotized against his will?"

"Some can, some can't." Marco smiled. "The average person, under average circumstances—no. I appear in my act to hypnotize people against their wills. Actually, subconsciously, they *wish* to be hypnotized, which is why they volun-

teer to let me try in the first place."

"Okay, number two. Is there any drug that can hypnotize a person?"

Marco frowned. "Pentothal and several things *appear* to do that. You could argue it either way, whether the subject is actually hypnotized or not. I believe post-hypnotic commands have been given to subjects under sodium pentathol and carried out, even back in the dark ages of psychiatry several hundred years ago."

"I've got one more really important question," Pell said then. "I'd understood that somebody under hypnosis won't do anything against his moral or ethical sense. An honest man, for instance, can't be forced to steal. Is that true?"

Marco laughed and gestured with his graceful fingers. "I don't think it is true. It was once believed to be, because hypnotic technique was not strong enough. That is, the subject's hypnosis was not strong enough to overcome a strong moral sense, which is actually a surface veneer on a deeper, more brutal nature. But I think with deep enough hypnosis, and the right kind of command, you can get a person to do most anything in post-hypnotic behavior—and of course not know why he *must* do it, even knowing it's wrong. Do you follow me?"

"I hope I do." Then Pell leaned forward. "And now I have a very great favor to ask of you."

"Yes?"

"I want you to put on a little special private performance for me, right here and now."

"I'm afraid I don't understand."

"You will, in about sixty seconds. Just listen carefully . . ."

Chapter V

HE WAS LATE for his date with Ciel, of course. He glanced at his chrono as he entered the Stardust Cafe by the front door and saw that he was twenty minutes late. However, this time he was certain Ciel wouldn't complain too vigorously.

Again the askarins were playing, and once more the green-skinned Venusian girls were doing their writhing, spasmodic, aphrodisiacal dance. It was remarkable how they could achieve such an effect of utter abandon and yet keep their faces blank and frozen. He looked around the rest of the room swiftly. Not so crowded tonight, and people were generally quieter. There were no oversexed spacemen clawing after the dancers on the floor.

Ciel was again in a rear booth, in the same corner of the room she had chosen before. She had spotted him now; she was looking his way. She lifted a white-gloved hand and waved.

He smiled and headed for her. He forced his smile, and made himself forget the prickling of his wrists and the feeling of bristling fur along his spine. And he held his smile all the way across the room. *Why, hello, darling, fancy seeing you here; no, nothing's wrong, nothing at all, why on earth would you think anything was wrong?*

"Hi, baby," was all he actually said.

"I'm—I'm glad you're here, Dick." Her eyes didn't show much. They roved over his face a little too much perhaps, but otherwise they seemed simply as large and dark as ever. He noticed that the meth glass in front of her was empty.

Grinning, he sat down. "This is a big moment. This is almost too much for me to handle. Maybe that's what I need—a good slug of meth."

"No."

"No?"

"Let's not waste time. Let's go out on the terrace. I want you to kiss me."

"Best offer I've had all evening." He rose again. "Where's the terrace?"

"Through that door. There's a dining room there that's closed at night. You go through the dining room and out to the terrace."

"Okay."

He took her arm and led her in and out of tables, across the room. They moved swiftly through the quiet, nearly dark dining room, and after that through a pair of window-doors. They were on the terrace then, a flagstoned space with a low wall. It overlooked the scattered lights of World City's topside area and some distance beyond they could see the river, a blue-silver ribbon in the moonlight.

They stopped at the wall. She turned toward him. He looked down at her, at her pale face and deep, dark eyes. He smelled her perfume and he felt her live warmth near him and coming nearer. He saw her eyes close, her

lips part just slightly, and each lip glistening, faintly moist

He was wondering when it would happen. He was wondering when he would be struck.

As he wondered that he suddenly discovered he wasn't on the terrace any more.

HE LOOKED ABOUT him in some surprise. It was nearly dark. He was in a room; he could sense the walls about him. He heard a curious, high-pitched metallic voice—and recognized it.

"Pell? Are you awake now?"

It had happened then, just as he had expected. Someone had thrown a freezer on him there in the patio, and during his complete unconsciousness he'd been taken here, wherever this was. He sighed. The least they could have done would have been to let him finish kissing Ciel.

As calmly as he could he said to the four blank walls, "I'm awake."

Soft glowlights came on gradually and he saw that the room about him was fairly small—twenty by fifteen, roughly—and very plain. It contained a bed and a few odd pieces of furniture, all apparently of good quality. There was a door in one wall. He tried the door. Locked. He went back to the middle of the room.

"Chief," he said to the blank walls, "what's this all about? Is it some kind of a joke?"

The metallic voice chuckled. It belonged to Eustace J. Larkin, Chief, Central Investigation Bureau, and even filtered like this it was somewhat prim and precise.

"No, Dick, it's not a joke, I'm afraid. I'm surprised you haven't guessed what it's all about. Or at least had one of your brilliant hunches." There was sarcasm in this last.

"Where's Ciel?" Pell asked.

"Right here with me. In the next room. Here—listen."

Ciel's voice said, "Don't worry, darling, we'll explain everything. And when it's all over it will be for the best. You'll see that it will."

"All right, everybody," said Pell, half-belligerently, "what's the big idea?"

"Big idea is right," Larkin's voice came back. "The biggest that ever hit the human race. And as Ciel says we'll explain it all in a moment. But first I'd like your word that you won't be foolish and make any kind of a struggle. If you'll promise that you can come in the other room here and we can all talk face to face."

Pell frowned. "I don't know—I'm not so sure I can honestly promise that."

"Suit yourself, then. A few minutes from now it won't make any difference anyway."

"Will you stop being so damned mysterious and tell me what it's all about?"

Larkin's voice laughed. "Very well. I haven't had much chance to tell about it, frankly. And I think you'll agree we've rather neatly kept our parts under cover—until you got dangerously close to the answer, anyway."

"Until I got close?"

"Certainly. Doc Wilcox's office on the moon was perhaps our one weakness in the whole set-up. How

you managed to stumble on to that, I'll never know—your luck must have been with you."

"It wasn't luck, Larkin, it was a hunch."

"Still believe in hunches, eh? Well, we won't argue the point. At any rate you wouldn't have found the enzyme any place else but there."

"Oh, so the enzyme does have something to do with it."

"Everything. Here—suppose I let Doctor Nebel explain it to you. He developed it, after all."

Pell lifted his eyebrows in surprise and Dr. Walter Nebel's sibilant voice came through the hidden speakers. "I think you should know how it works, Mr. Pell. You may know that a certain part of the brain called Rossi's area is, to put it figuratively, the hypnotic center. The cut-off of the adrenal cortex, so to speak. In ordinary hypnosis the function of that area is dulled by overexercising the motor senses. By that method the intensity of hypnosis is widely variable and never really one hundred per cent effective. My compound, however, brings about complete and absolute cut-off. Any post-hypnotic suggestion given under those circumstances takes permanently and deeply. It can only be removed by further post-hypnosis under the same treatment, negating the original command."

Pell stared at the blank walls. "Go on," he said in a soft, tense voice. "What's the rest?"

Larkin spoke again. "Suppose we briefly examine a little history as a kind of introduction to this matter. The human race, since the begin-

ning of recorded time, has failed to achieve real peace and stability, right? Every time there has been a chance for cooperative effort—for total agreement—certain selfish interests have spoiled it. There have been times, however, when certain groups—states or combinations of states—came close to permanent peace and prosperity. The Napoleonic era was one. Hitler two hundred years ago almost brought it about. The only reason they failed was that they didn't achieve their goal—*complete conquest*."

Did Pell hear correctly? Was there a faint simmering of madness in that metallic voice now? In the words there was madness, surely . . .

IT WENT ON: "The fact is, Pell, people simply don't know what's good for them. Look at the blunderers and even downright crooks who are elected to World Government. Never the best brains, never the best talents. When a really able man gets into a position of leadership it's an accident—a fluke."

"I still don't see what all this has got to do with it," said Pell.

There was a shrug in the metallic voice. "For once the ablest men are going to take over. There are a number of us. You know already about myself and Doctor Nebel. Rysland will be with us, too, as soon as we can get him conditioned."

"By conditioned, you mean this enzyme of yours?"

"Exactly. We started out in a small way, using force or trickery

where necessary, and managed to condition a number of doctors and nurses. Conditioning simply means injecting Nebel's compound and then giving the post-hypnotic command to be unquestioningly loyal to the Supremists. We created the Supremists, of course. In order for us to take over it will be necessary to have another war, and to conquer Venus. That can be done if Earth strikes quickly. Within the next few days I think there'll be enough Supremist influence to get this war started."

Pell stared back, open-mouthed. To hear it coldly and calmly like this was shock, cold-water shock. "Let me get this straight now. Your group made Supremists of doctors and nurses and they in turn made new members by installing this hypnosis stuff whenever anybody came for a hypodermic injection of any kind, is that it?"

"That's it."

"But how does this stuff work? Does it knock you out, or what?"

"You'll be finding that out at first hand very shortly."

Pell stiffened, made fists and unconsciously lifted them and looked around him, warily.

Larkin laughed. "It won't do you much good to put up a fight. I'm sending a couple of my assistants in there. They specialize in people who want to make a struggle. And there's no reason to feel unhappy about it, Pell: once you're conditioned you'll simply be unable to do anything against the Supremist cause. You'll be happier, in fact, having such a cause. Ask your wife if that isn't so."

Pell trembled with anger. "How

did you get to her? How did you make her do what she did?"

"You mean luring you into our little trap on the terrace, so to speak? You mustn't blame Ciel for that. She couldn't help herself; she had to obey, after all. You see she was conditioned in Augea on the moon by Dr. Wilcox, one of our very loyal men. He simply dropped in when you were at the Post Office, pretended that Ciel needed a routine injection and she, not at all suspicious, allowed him to do it. He gave her the command of loyalty, and also cautioned her not to say anything about it. So you see, Ciel's been one of us for several days. It was just a little precaution of mine, in case you should become troublesome. I had to assign somebody to the investigation, of course, because Rysland and his crowd would have been too suspicious if I hadn't complied with their request."

"You're stark crazy, Larkin! You ought to be in a mental hospital!"

"You'll be over that idea in a minute or so. Meanwhile, we're wasting time. I'm sending the boys in now. You'll make it easier for yourself if you submit without giving them any trouble."

The door opened, then. Pell caught a quick glimpse of the other room and saw that it was a tastefully furnished living room. He recognized it, and knew where he was. This was a country house of Larkin's, topside, not far from the outskirts of World City. Whoever turned the freezer on him must have set the control at high intensity because it would take at least an hour to get to this place from

the Stardust Cafe and he had been unconscious at least that long.

He had the momentary impulse to rush that partly opened door—and then the boys, as Larkin had called them, appeared.

THEY WERE SPECIALISTS, little doubt of that. They regarded Pell with flat, almost disinterested looks as the door closed behind them. One held a hypodermic needle. He was the shorter of the two, but he had shoulders like ox-yokes. His face had been kneaded in the prize ring, and his bare arms were muscular and hairy but the top of his head was bald. The other had red hair, close-cropped. He was big and well-proportioned; Pell might have taken him for a professional football player.

Red did the talking. He spoke quietly, almost pleasantly. "Gonna cooperate?" he asked Pell.

Pell said, "You touch me, brother, and I'll make your face look like Baldy's."

Red glanced at Baldy and seemed to sigh. Abruptly he whirled, jumped at Pell and brought a sizzling right hand punch through the air. Pell ducked it. He saw Baldy move in as he did so, and a painful blow struck the back of his neck. His teeth rattled when it struck. Something caught him under the chin, straightened him. When he was straight a pile driver struck him in the midsection.

It was all over within a matter of seconds. Under different circumstances Pell might have found time to admire their technique.

As it was, he was now face down

on the floor and Red was straddling him, holding him there. The pain in his stomach made him gasp. His face and the back of his neck ached terribly.

Red had his arm in the small of his back. Pell tried to struggle.

"I can break the arm if you move," said Red cheerfully.

And then Pell felt the bite of the needle just below his shoulder.

A misty feeling came. He felt as though he were in a red whirlpool, spinning, going down—down. . . . He fought to rise. He could still hear. He could hear footsteps and the slam of the door when somebody else came into the room. And then he seemed abruptly to be detached from his own body and floating in a huge gray void. . . .

Words hammered at his brain. Larkin's voice, at his ear now and no longer metallic. *"You will be loyal to the Supremist cause. You will do nothing against the Supremist doctrine. You will believe that Earthmen are meant to rule the Universe—"*

He felt an overpowering impulse to nod, to agree, to believe that it was right to do this. He fought this impulse, straining his mind and his very being until it seemed that something might burst with the effort.

"You will work for the cause; you will give your life for it if necessary."

Yes, perhaps it was better so succumb. The words were too strong. He couldn't fight them. Larkin was right, Earthmen were supreme, and they were destined to rule. . . .

Somewhere in the depths a tiny spot of resistance still glowed. He

tried desperately to evoke it. It seemed then that it became brighter. He *could* resist—he *would*. . . . He kept thinking over and over again: *"No, no, no!"*

Larkin's voice said, "Carry him in the other room. He'll come to in a moment."

HE CAME TO slowly, and he saw that he was lying on a couch and that several people were gathered around him smiling down at him. Something detached itself from the group, knelt by his side. He blinked. It was Ciel. Her golden hair shone and her dark eyes searched his face and she was smiling. "Hello, darling," she said.

"Hello, Ciel." He kissed her, and then sat up on the couch and looked around.

Larkin and Dr. Nebel were standing together, and Red and Baldy were a few steps behind them, still looking indifferent.

"Now you're one of us, Dick," said Larkin, flashing his professional smile, dimples and everything. Pell rose. Nebel held his hands behind his back and beamed, blinking his heavy reptilian eyelids and Larkin stepped forward and held out his hand.

"Yes," said Pell, shaking the hand, "I guess we're all working for the same thing now. What do you want me to do?"

Larkin laughed. "Nothing right away. We'll give you instructions when the time comes. I think you might as well go home with Ciel now; I have a copter and a chauffeur outside that'll take you to the station near your apartment."

"Okay, Chief, whatever you say." He smiled and took Ciel's arm. He started toward the door. Then he stopped, patted his chest and said, "Oh—my freezer. I guess the boys took it away. . . ."

Larkin turned to Baldy. "Give him his weapon."

Baldy took the freezer from his pocket and casually tossed it to Pell.

A sudden change came over Pell, then. His smile disappeared. He stepped quickly away from Ciel, whirled and faced all of them. He pointed the freezer. "All right, everybody stay perfectly still—you, too, Ciel. This is where we break up your little Supremist nightmare."

Larkin stared in utter amazement. Nebel's turtle lids opened wide. Ciel brought her hand to her throat.

Red's hand blurred suddenly, going for his own weapon. Pell squeezed the trigger, the violet sparks danced for an instant, and then Red stood frozen with his hand almost to his chest.

"I'd advise nobody else to try that," said Pell, and then in an ironical tone to Larkin: "C.I.B. agents are trained to be pretty quick with a freezer, right, Chief?"

Larkin seemed to find his voice now. "But — how — what happened? You were injected. How can you . . . ?"

"I just took a little precaution, that's all," said Pell. "There'll be plenty of time to explain it all later. You'll probably hear the whole thing in court, Larkin, when I testify at your trial for treason. Meanwhile, all of you just stay nice and calm while I use the viewer."

He stepped to the viewer and

dialed with his free hand. The plate glowed, shimmered and a moment later the pale, grave face of Theodor Rysland came into view. His eyebrows rose as he saw the weapon in Pell's hand and glimpsed the people beyond Pell. "Hello—what's this all about?"

"Haven't time to explain fully now," said Pell, "but I want you to get to Larkin's country house as soon as you can. I'll call agent Kronski in a moment and have him bring some others, and together we'll take Larkin and Nebel into custody. They're behind the Supremist movement—a deliberate attempt to take over the government. They did it with a drug; that's how Supremist's are made."

"What's this? A drug?"

"Think about it later," said Pell. "Just grab the facts right now. The drug makes a person subject to post-hypnotic commands—that's why your Supremists are blindly, unthinkingly loyal. However, the command can be erased by a second treatment. That'll be tough and take a lot of ferreting out, but it won't be impossible." He glanced at Ciel, and saw that she was staring at him with horror—with enmity. It sickened him, but he steadied himself with the realization that Ciel would be one of the first to be re-treated.

SEVERAL MINUTES later he had completed his calls. Rysland, Kronski and the others were on the way. He kept the freezer pointed, and watched his captives carefully. Ciel had gone over to the couch and was sitting there, her

face in her hands, weeping softly.

"I don't know how you did it," said Larkin. "I don't understand it. The injection should have worked. It always did before."

"Well, it almost worked," said Pell. "I must admit I had quite a time fighting off your commands. But, you see, I knew you'd gotten to Ciel somehow when she called me up to make the date this evening. She spoke of going out to the terrace at the Stardust Cafe. It was a little odd that she should speak of the terrace like that, out of a clear sky—and I wondered why it should be on her mind. Then it struck me that neither of us had ever noticed a terrace there, and Ciel must have some special reason for knowing about it.

"She did, of course—she'd been instructed to get me out there where your boys could slap a freezer on me. So I started guessing with that hunch to work on. Everything more or less fell into place after that. It was pretty certain that they'd try to make a loyal Supremist out of me, too, and that's when I took that little precaution I mentioned to you."

"What precaution?"

Pell smiled. "I had Marco the mentalist hypnotize me and give me

a rather special post-hypnotic command. He ordered me not to believe any *subsequent* post-hypnotic commands. That's why your conditioning didn't work on me."

Larkin could find no words; he just stared.

"Think about it, Larkin," said Pell. "Think hard. Maybe you'd convinced yourself you were doing good, but your purpose was still tyranny. And like any tyranny it contained the means of its own destruction. It always works out that way, Larkin—maybe it's a law, or something."

It had been a long speech for Pell, practically an oration. He was, after all, a cop, not a philosopher. Just a guy trying to get along. Just an ordinary citizen whose name was legion, looking at his wife now and waiting with what patience he could find for the time when she would be cleared of the poisonous doctrine that any one race or group or even species was supreme.

He was thinking, too, that the trial would keep him busy as the very devil and that they *still* wouldn't get to that vacation and second honeymoon for a long time. . . .

That, considering everything, was not too much to put up with.

THE END

WE WANT YOUR LETTERS! It's true "The Postman Cometh" is small, and we'll continue this policy of devoting most of our space to the best available stories. But if you'll take time (and a postcard) to tell us which stories you like best, we'll tabulate and run the results in a special section—and of course our future selections will be based on your wishes. Fair enough?



*She was sweet, gentle, kind—
a sort of Martian Old Mother
Hubbard. But when she went
to her cupboard. . .*

ONE MARTIAN AFTERNOON

By Tom Leahy

Illustrated by BRUSH

THE CLOD burst in a cloud of red sand and the little Martian sand dog ducked quickly into his burrow. Marilou threw another at the aperture in the ground and then ran over and with the inside of her foot she scraped sand into it until it was filled to the surface. She started to leave, but stopped.

The little fellow might choke to death, she thought, it wasn't his fault she had to live on Mars. Satisfied that the future of something was dependent on her whim, she dug the sand from the hole. His little yellow eyes peered out at her.

"Go on an' live," she said magnanimously.

She got up and brushed the sand from her knees and dress, and

walked slowly down the red road.

The noon sun was relentless; nowhere was there relief from it. Marilou squinted and shaded her eyes with her hand. She looked in the sky for one of those infrequent Martian rain clouds, but the deep blue was only occasionally spotted by fragile white puffs. Like the sun, they had no regard for her, either. They were too concerned with moving toward the distant mountains, there to cling momentarily to the peaks and then continue on their endless route.

Marilou dabbed the moisture from her forehead with the hem of her dress. "I know one thing," she mumbled. "When I grow up, I'll get to Earth an' never come back to Mars, no matter what!"

She broke into a defiant, cadenced step.

"An' I won't care whether you an' Mommy like it or not!" she declared aloud, sticking out her chin at an imaginary father before her.

Before she realized it, a tiny, lime-washed stone house appeared not a hundred yards ahead of her. That was the odd thing about the Martian midday; something small and miles away would suddenly become large and very near as you approached it.

The heat waves did it, her father had told her. "Really?" she had replied, and—you think you know so doggone much, she had thought.

AUNT TWYLEE!" She broke into a run. By the Joshua trees, through the stone gateway she ran, and with a leap she lit like a young frog on the porch. "Hi,

Aunt Twylee!" she said breathlessly.

An ancient Martian woman sat in a rocking chair in the shade of the porch. She held a bowl of purple river apples in her lap. Her papyrus-like hands moved quickly as she shaved the skin from one. In a matter of seconds it was peeled. She looked up over her bifocals at the panting Marilou.

"Gracious child, you shouldn't run like that this time of day," she said. "You Earth children aren't used to our Martian heat. It'll make you sick if you run too much."

"I don't care! I hate Mars! Sometimes I wish I could just get good an' sick, so's I'd get to go home!"

"Marilou, you *are* a little tyrant!" Aunt Twylee laughed.

"Watcha' doin', Aunt Twylee?" Marilou asked, getting up from her frog posture and coming near the old Martian lady's chair.

"Oh, peeling apples, dear. I'm going to make a cobbler this afternoon." She dropped the last apple, peeled, into the bowl. "There, done. Would you like a little cool apple juice, Marilou?"

"Sure—you betcha! Hey, could I watch you make the cobbler, Aunt Twylee, could I? Mommy can't make it for anything—it tastes like glue. Maybe, if I could see how you do it, maybe I could show her. Do you think?"

"Now, Marilou, your mother must be a wonderful cook to have raised such a healthy little girl. I'm sure there's nothing she could learn from me," Aunt Twylee said as she arose. "Let's go inside and have

that apple juice."

The kitchen was dark and cool, and filled with the odors of the wonderful edibles the old Martian had created on and in the Earth-made stove. She opened the Earth-made refrigerator that stood in the corner and withdrew an Earth-made bottle filled with Martian apple juice.

Marilou jumped up on the table and sat cross-legged.

"Here, dear." Aunt Twylee handed her a glass of the icy liquid.

"Ummm, thanks," Marilou said, and gulped down half the contents. "That tastes dreamy, Aunt Twylee."

The little girl watched the old Martian as she lit the oven and gathered the necessary ingredients for the cobbler. As she bent over to get a bowl from the shelf beneath Marilou's perch, her hair brushed against the child's knee. Her hair was soft, soft and white as a puppy's, soft and white like the down from a dandelion. She smiled at Marilou. She always smiled; her pencil-thin mouth was a perpetual arc.

Marilou drained the glass. "Aunt Twylee—is it true what my daddy says about the Martians?"

"True? How can I say, dear? I don't know what he said."

"Well, I mean, that when us Earth people came, you Martians did inf . . . infan . . ."

"Infanticide?" Aunt Twylee interrupted, rolling the dough on the board a little flatter, a little faster.

"Yes, that's it—killed babies," Marilou said, and took an apple from the bowl. "My daddy says you were real primitive, an' killed your

babies for some silly religious reason. I think that's awful! How could it be religious? God couldn't like to have little babies killed!" She took a big bite of the apple; the juice ran from the corners of her mouth.

"Your daddy is a very intelligent man, Marilou, but he's partially wrong. It is true—but not for religious reasons. It was a necessity. You must remember, dear, Mars is very arid—sterile—unable to sustain many living things. It *was* awful, but it was the only way we knew to control the population."

MARILOU LOOKED down her button nose as she picked a brown spot from the apple. "Hmmpf, I'll tell 'im he's wrong," she said. "He thinks he knows so damn much!"

"Marilou!" Aunt Twylee exclaimed as she looked over her glasses. "A sweet child like you shouldn't use such language!"

Marilou giggled and popped the remaining portion of the apple in her mouth.

"Do your parents know where you are, child?" Aunt Twylee asked, as she took the bowl from Marilou's hands. She began dicing the apples into a dough-lined casserole.

"No, they don't," Marilou replied. She sprayed the air with little particles of apple as she talked. "Everybody's gone to the hills to look for the boys."

"The boys?" Aunt Twylee stopped her work and looked at the little girl.

"Yes—Jimmy an' Eddie an' some

of the others disappeared from the settlement this morning. The men're afraid they've run off to th' hills an' the renegades got 'em."

"Gracious," Aunt Twylee said; her brow knitted into a criss-cross of wrinkles.

"Oh, I know those dopes. They're prob'ly down at th' canals —fishin' or somep'n."

"Just the same, your mother will be frantic, dear. You should have told her where you were going."

"I don't care," Marilou said with unadulterated honesty. "She'll be all right when I get home."

Aunt Twylee shook her head and clucked her tongue.

"Can I have another glass? Please?"

The old lady poured the glass full again. And then she sprinkled sugar down among the apple cubes in the cassarole and covered them with a blanket of dough. She cut an uneven circle of half moons in it and put it in the oven. "There—all ready to bake, Marilou," she sighed.

"It looks real yummy, Aunt Twylee."

"Well, I certainly hope it turns out good, dear," she said, wiping her forehead with her apron. She looked out the open back door. The landscape was beginning to gray as heavier clouds moved down from the mountains and pressed the afternoon heat closer, more oppressively to the ground. "My, it's getting hot. I wouldn't be a bit surprised if we didn't get a little rain this afternoon, Marilou." She turned back to the little girl. "Tell me some more about your daddy, dear. We Martians certainly owe a

lot to men like your father."

"That's what he says too. He says, you Martians would have died out in a few years, if we hadn't come here. We're so much more civi . . . civili . . ."

"Civilized?"

"Yeah. He says, we were so much more 'civ-ized' than you that we saved your lives when we came here with all our modern stuff."

"Well, that's true enough, dear. Just look at that wonderful Earth stove," Aunt Twylee said, and laughed. "We wouldn't be able to bake an apple cobbler like that without it, would we?"

ARUMBLE of thunder shouledered through the crowded hot air.

"No. He says, you Martians are kinda likeable, but you can't be trusted. He's nuts! *I* like you Martians!"

"Thank you, child, but everyone's entitled to his own opinion. Don't judge your daddy too severely," Aunt Twylee said as she scraped spilled sugar from the table and put little bits of it on her tongue.

"He says that you'd bite th' hand that feeds you. He says, we brought all these keen things to Mars, an' that if you got th' chance, you'd kill all of us!"

"Gracious," said Aunt Twylee as she speared scraps of dough with the point of her long paring knife.

"He's a dope!" Marilou said.

Aunt Twylee opened the oven and peeked in at the cobbler. The aroma of the simmering apples rushed out and filled the room.

"Could I have some cobbler when it's done?" Marilou asked, her mouth filling with saliva.

"I'm afraid not, child. It's getting rather late."

The thunder rumbled again—a little closer, a little louder.

The old lady washed the blade of the knife in the sink. "Tell me more of what your father says, dear," she said as she adjusted the bifocals on her thin nose and ran her thumb along the length of the knife's blade.

"Oh, nothin' much more. He just says that you'd kill us if you had th' chance. That's the way the inferior races always act, he says. They want to kill th' people that help 'em, 'cause they resent 'em."

"Very interesting."

"Well, it isn't so, is it, Aunt Twylee?"

The room was filled with blinding blue-white light, and the walls quaked at the sound of a monstrous thunderclap.

The old Martian glanced nervously at the clock on the wall. "My, it is getting late," she said as she fondled the knife in her hands.

"You Martians wouldn't do anything like that, would you?"

"You want the truth, don't you, dear?" Aunt Twylee asked, smiling, as she walked to the table where Marilou sat.

"Course I do, Aunt Twylee," she said.

Her scream was answered and smothered by the horrendous roar of the thunder, and the piercing hiss of the rain that fell in sheets. In great volumes of water, it fell, as though the heavens were attempting to wash the sins of man from the universe and into non-existence in the void beyond the void.

MARILOU LAY beside the other children. Aunt Twylee smiled at them, closed the bedroom door and returned to the kitchen.

The storm had moved on; the thunder was the faint grumbling of a pacified old man. What water fell was a monotonous trickle from the eaves of the lime-washed stone house. Aunt Twylee washed the blood from the knife and wiped it dry on her apron. She opened the oven and took out the browned cobbler. Sweet apple juice bubbled to the surface through the half moons and burst in delights of sugary aroma. The sun broke through the thinning edge of the thunderhead.

Aunt Twylee brushed a lock of her feathery white hair from her moist cheek. "Gracious," she said, "I must tidy up a bit before the others come."



Donald W. Kerst

DONALD W. KERST is probably unknown except in the upper strata of scientific research, but he's the man who is almost solely responsible for the betatron.

The lanky six-footer was born in Galena, Kansas, in 1911. The Kerst family moved to Wauwatosa, Wisconsin, when Donald was less than two years old, and it was in this small town that Don grew up and went to high school. He had a school chum who was an ardent amateur radio operator, and it was while helping this friend build constantly better ham apparatus that Donald Kerst's interest in science grew into an abiding passion. He entered the University of Wisconsin where he got both his B. A. and his Ph.D. After a year at the Gen-

Personalities in Science

*His Specialty: Turning
New Corners*

eral Electric Laboratories working with X-ray tubes, he accepted the post of Professor of Physics at the University of Iowa.

Kerst had started research into the nature of the atom while studying for his doctorate, and now he picked up where he had left off. In 1941 he was able to announce that he had achieved a new instrument of research capable of accelerating electrons to a velocity approximating the speed of light, or 186,000 miles per second! He described this new tool as a "rheotron, the heart of which is a doughnut-shaped glass vacuum tube placed between the poles of a large electromagnet."

The United States Government snapped up the new instrument for use in arsenals and on the Manhattan Project during the war. It was a dependable, foolproof, economical tool with the ability to penetrate twenty inches of steel with its radiation in twenty minutes, and to detect flaws of two-thousandths of an inch. The units used in arsenals are able to detect flaws in bombs and shells so they can be corrected, eliminating any danger of the projectiles exploding prematurely.

The commercial betatron was five feet by ten feet and housed behind a three-foot reinforced concrete wall in a specially designed building. In this particular machine the electrons from a hot filament were speeded in their acceleration by electrical impulses until they reached 20,000,000 volts—then released from the tube as beta rays or directed at a metal target which converted them into X-rays.

ALTHOUGH the government was using the betatron during the war and finding it most satisfactory, Kerst went right on improving the machine and its performance. Ever since the first betatron worked, the desire of the scientists and physicists was to produce particles with cosmic ray energies. Within four years after the commercial betatron, Kerst was able to produce one that achieved a 22,000,000-volt free-electron beam with which it was possible to penetrate to the core of the atom and to study the nucleus in a way that had never before been possible.

After fifteen months of actual construction work the super-betatron was ready for a trial run. When asked by reporters to predict the performance of the machine and the possibility that mesons could be produced, Kerst answered, "To ask what we expect is like asking what's around a corner that we've never gone around before." Two days after the unveiling the super-betatron fulfilled all hopes and produced what has been described as "torrents of mesons."

In order to understand just what

the invention of the betatron means, we need to know exactly what a meson is. What we know about it is rather slim, as a matter of fact, and what we hope to learn with the help of the super-betatron is of vital importance. The meson is the fourth basic particle of subatomic matter (the other three are the proton, the neutron and the electron). It is believed to be the binding force that holds all nuclei together. Heretofore mesons have been studied by means of high-altitude balloons with special photographic apparatus to record their passage once they've been split from the nuclei in the earth's atmosphere by incoming cosmic rays. The force necessary to split the mesons from the nuclei has up until now been unattainable anywhere but at this high altitude.

The program of improving the betatron and making it an even more useful tool than the present model goes right on, with Dr. Donald Kerst working at it full time. The blue-eyed, brown-haired man of science has little time for leisure; he feels that there is too much left undone in this particular field. His wife Dorothy and his young son and daughter know that the one way to get Dad's nose off the grindstone is to suggest a family canoeing or skiing excursion. These are his favorite recreations.

"As long as the water holds out and the snow stays, we know we can have him around with us," says Mrs. Kerst, "but you can't stop him from mulling things over even then. He's what you might call 'wrapped up in his work'."

—epw

Does your wife call you Pumpkinhead? Well, maybe it's not an insult; it might be a pet name. Ah—but whose pet name?

WEAK ON SQUARE ROOTS

By Russell Burton

Illustrated by TOM BEECHAM

AS HIS COACH sped through dusk-darkened Jersey meadows, Ronald Lovegear, fourteen years with Allied Electronix, embraced his burden with both arms, silently cursing the engineer who was deliberately rocking the train. In his thin chest he nursed the conviction that someday there would be an intelligent robot at the throttle of the 5:10 to Philadelphia.

He carefully moved one hand and took a notebook from his pocket. That would be a good thing to mention at the office next Monday.

Again he congratulated himself for having induced his superiors to let him take home the company's most highly developed mechanism to date. He had already forgiven himself for the little white lie that morning.

"Pascal," he had told them, "is a little weak on square roots." That had done it!

Old Hardwick would never permit an Allied computer to hit the

market that was not the absolute master of square roots. If Lovegear wanted to work on Pascal on his own time it was fine with the boss.

Ronald Lovegear consulted his watch. He wondered if his wife would be on time. He had told Corinne twice over the phone to bring the station wagon to meet him. But she had been so forgetful lately. It was probably the new house; six rooms to keep up without a maid was quite a chore. His pale eyes blinked. He had a few ideas along that line too. He smiled and gave the crate a gentle pat.

CORINNE WAS at the station, and she had brought the station wagon. Lovegear managed to get the crate to the stairs of the coach where he consented to the assistance of a porter.

"It's not really heavy," he told Corinne as he and the porter wad-



By B. B. C. 1941

dled through the crowd. "Actually only 57 pounds, four ounces. Aluminum casing, you know. . . ."

"No, I didn't. . . ." began Corinne.

"But it's delicate," he continued. "If I should drop this. . . ." He shuddered.

After the crate had been placed lengthwise in the rear of the station wagon, Corinne watched Ronald tuck a blanket around it.

"It's not very cold, Ronald."

"I don't want it to get bounced around," he said. "Now, please, Corinne, do drive carefully." Not until she had driven half a block did he kiss her on the cheek. Then he glanced anxiously over his shoulder at the rear seat. Once he thought Corinne hit a rut that could have been avoided.

Long after Corinne had retired that night she heard Ronald pounding with a brass hammer down in his den. At first she had insisted he take the crate out to his workshop. He looked at her with scientific aloofness and asked if she had the slightest conception of what "this is worth?" She hadn't, and she went to bed. It was only another one of his gestures which was responsible for these weird dreams. That night she dreamed Ronald brought home a giant octopus which insisted on doing the dishes for her. In the morning she woke up feeling unwanted.

Downstairs Ronald had already put on the coffee. He was wearing his robe and the pinched greyness of his face told Corinne he had been up half the night. He poured coffee for her, smiling wanly. "If I have any commitments today, Corinne, will you please see that

they are taken care of?"

"But you were supposed to get the wallpaper for the guest room. . . ."

"I know, I know, dear. But time is so short. They might want Pascal back any day. For the next week or two I shall want to devote most of my time. . . ."

"Pascal?"

"Yes. The machine—the computer." He smiled at her ignorance. "We usually name the expensive jobs. You see, a computer of this nature is really the heart and soul of the mechanical man we will construct."

Corinne didn't see, but in a few minutes she strolled toward the den, balancing her coffee in both hands. With one elbow she eased the door open. There it was: an innocent polished cabinet reaching up to her shoulders. Ronald had removed one of the plates from its side and she peeped into the section where the heart and soul might be located. She saw only an unanatomical array of vacuum tubes and electrical relays.

She felt Ronald at her back. "It looks like the inside of a juke box," she said.

He beamed. "The same relay systems used in the simple juke box are incorporated in a computer." He placed one hand lovingly on the top of the cabinet.

"But, Ronald—it doesn't even resemble a—a mechanical man?"

"That's because it doesn't have any appendages as yet. You know, arms and legs. That's a relatively simple adjustment." He winked at Corinne with a great air of complicity. "And I have some excellent

ideas along that line. Now, run along, because I'll be busy most of the day."

CORINNE RAN along. She spent most of the day shopping for week-end necessities. On an irrational last-minute impulse—perhaps an unconscious surrender to the machine age—she dug in the grocery deep freeze and brought out a couple of purple steaks.

That evening she had to call Ronald three times for dinner, and when he came out of the den she noticed that he closed the door the way one does upon a small child. He chattered about inconsequential matters all through dinner. Corinne knew that his work was going smoothly. A few minutes later she was to know how smoothly.

It started when she began to put on her apron to do the dishes. "Let that go for now, dear," Ronald said, taking the apron from her. He went into the den, returning with a small black box covered with push buttons. "Now observe carefully," he said, his voice pitched high.

He pushed one of the buttons, waited a second with his ear cocked toward the den, then pushed another.

Corinne heard the turning of metal against metal, and she slowly turned her head.

"Oh!" She suppressed a shriek, clutching Ronald's arm so tightly he almost dropped the control box.

Pascal was walking under his own effort, considerably taller now with the round, aluminum legs Ronald had given him. Two metal arms

also hung at the sides of the cabinet. One of these raised stiffly, as though for balance. Corinne's mouth opened as she watched the creature jerk awkwardly across the living room.

"Oh, Ronald! The fishbowl!"

Ronald stabbed knowingly at several buttons.

Pascal pivoted toward them, but not before his right arm swung out and, almost contemptuously, brushed the fishbowl to the floor.

Corinne closed her eyes at the crash. Then she scooped up several little golden bodies and rushed for the kitchen. When she returned Ronald was picking up pieces of glass and dabbing at the pool of water with one of her bathroom towels. Pascal, magnificently aloof, was standing in the center of the mess.

"I'm sorry." Ronald looked up. "It was my fault. I got confused on the buttons."

But Corinne's glances toward the rigid Pascal held no indictment. She was only mystified. There was something wrong here.

"But Ronald, he's so ugly without a head. I thought that all robots—"

"Oh, no," he explained, "we would put heads on them for display purposes only. Admittedly that captures the imagination of the public. That little adapter shaft at the top could be the neck, of course...."

He waved Corinne aside and continued his experiments with the home-made robot. Pascal moved in controlled spasms around the living room. Once, he walked just a little too close to the floor-length win-

dow—and Corinne stood up nervously. But Ronald apparently had mastered the little black box.

With complete confidence Corinne went into the kitchen to do the dishes. Not until she was elbow deep in suds did she recall her dreams about the octopus. She looked over her shoulder, and the curious, unwanted feeling came again.

THE FOLLOWING afternoon—after Ronald had cancelled their Sunday drive into the country—Pascal, with constant exhortations by Ronald at the black box, succeeded in vacuum cleaning the entire living room. Ronald was ecstatic.

"Now do you understand?" he asked Corinne. "A mechanical servant! Think of it! Of course mass production may be years away, but . . ."

"Everyone will have Thursday nights off," said Corinne—but Ronald was already jabbing at buttons as Pascal dragged the vacuum cleaner back to its niche in the closet.

Later, Corinne persuaded Ronald to take her to a movie, but not until the last moment was she certain that Pascal wasn't going to drag along.

Every afternoon of the following week Ronald Lovegear called from the laboratory in New York to ask how Pascal was getting along.

"Just fine," Corinne told him on Thursday afternoon, "But he certainly ruined some of the tomato plants in the garden. He just doesn't seem to hoe in a straight line. Are

you certain it's the green button I push?"

"It's probably one of the pressure regulators," interrupted Ronald. "I'll check it when I get home." Corinne suspected by his lowered voice that Mr. Hardwick had walked into the lab.

That night Pascal successfully washed and dried the dishes, cracking only one cup in the process. Corinne spent the rest of the evening sitting in the far corner of the living room, thumbing the pages of a magazine.

On the following afternoon—prompted perhaps by that perverse female trait which demands completion of all projects once started—Corinne lingered for several minutes in the vegetable department at the grocery. She finally picked out a fresh, round and blushing pumpkin.

Later in her kitchen, humming a little tune under her breath, Corinne deftly maneuvered a paring knife to transform the pumpkin into a very reasonable facsimile of a man's head. She placed the pumpkin over the tiny shaft between Pascal's box-shaped shoulders and stepped back.

She smiled at the moon-faced idiot grinning back at her. He was complete, and not bad-looking! But just before she touched the red button once and the blue button twice—which sent Pascal stumbling out to the backyard to finish weeding the circle of pansies before dinner—she wondered about the gash that was his mouth. She distinctly remembered carving it so that the ends curved upward into a frozen and quite harmless smile. But one

end of the toothless grin seemed to sag a little, like the cynical smile of one who knows his powers have been underestimated.

Corinne would not have had to worry about her husband's reaction to the new vegetable-topped Pascal. Ronald accepted the transformation good-naturedly, thinking that a little levity, once in a while, was a good thing.

"And after all," said Corinne later that evening, "I'm the one who has to spend all day in the house with . . ." She lowered her voice: "With Pascal."

But Ronald wasn't listening. He retired to his den to finish the plans for the mass production of competent mechanical men. One for every home in America. . . He fell asleep with the thought.

CORINNE AND PASCAL spent the next two weeks going through pretty much the same routine. He, methodically jolting through the household chores; she, walking aimlessly from room to room, smoking too many cigarettes. She began to think of Pascal as a boarder. Strange—at first he had been responsible for that unwanted feeling. But now his helpfulness around the house had lightened her burden. And he was so cheerful all the time! After living with Ronald's preoccupied frown for seven years. . .

After luncheon one day, when Pascal neglected to shut off the garden hose, she caught herself scolding him as if he were human. Was that a shadow from the curtain

waving in the breeze, or did she see a hurt look flit across the mouth of the pumpkin? Corinne put out her hand and patted Pascal's cylindrical wrist.

It was warm—*flesh* warm.

She hurried upstairs and stood breathing heavily with her back to the door. A little later she thought she heard someone—someone with a heavy step—moving around downstairs.

"I left the control box down there," she thought. "Of course, it's absurd. . . ."

At four o'clock she went slowly down the stairs to start Ronald's dinner. Pascal was standing by the refrigerator, exactly where she had left him. Not until she had started to peel the potatoes did she notice the little bouquet of pansies in the center of the table.

Corinne felt she needed a strong cup of tea. She put the water on and placed a cup on the kitchen table. Not until she was going to sit down did she decide that perhaps Pascal should be in the other room.

She pressed the red button, the one which should turn him around, and the blue button, which should make him walk into the living room. She heard the little buzz of mechanical life as Pascal began to move. But he did not go into the other room! He was holding a chair for her, and she sat down rather heavily. A sudden rush of pleasure reddened her cheeks. *Not since sorority days. . .*

Before Pascal's arms moved away she touched his wrist again, softly, only this time her hand lingered. And his wrist was warm!

"WHEN DO THEY want Pascal back at the lab?" she asked Ronald at dinner that evening, trying to keep her voice casual.

Ronald smiled. "I think I might have him indefinitely, dear. I've got Hardwick convinced I'm working on something revolutionary." He stopped. "Oh, Corinne! You've spilled coffee all over yourself."

The following night Ronald was late in getting home from work. It was raining outside the Newark station and the cabs deliberately evaded him. He finally caught a bus, which deposited him one block from his house. He cut through the back alley, hurrying through the rain. Just before he started up the stairs he glanced through the lighted kitchen window. He stopped, gripping the railing for support.

In the living room were Pascal and Corinne. Pascal was reclining leisurely in the fireside chair; Corinne was standing in front of him. It was the expression on her face which stopped Ronald Lovegear. The look was a compound of restraint and compulsion, the reflection of some deep struggle in Corinne's soul. Then she suddenly leaned forward and pressed her lips to Pascal's full, fleshy pumpkin mouth. Slowly, one of Pascal's aluminum arms moved up and encircled her waist.

Mr. Lovegear stepped back into the rain. He stood there for several minutes. The rain curled around the brim of his hat, dropped to his face, and rolled down his cheeks

with the slow agitation of tears.

When, finally, he walked around to the front and stamped heavily up the stairs, Corinne greeted him with a flush in her cheeks. Ronald told her that he didn't feel "quite up to dinner. Just coffee, please." When it was ready he sipped slowly, watching Corinne's figure as she moved around the room. She avoided looking at the aluminum figure in the chair.

Ronald put his coffee down, walked over to Pascal, and, gripping him behind the shoulders, dragged him into the den.

Corinne stood looking at the closed door and listened to the furious pounding.

TEN MINUTES LATER Ronald came out and went straight to the phone.

"Yes! Immediately!" he told the man at the freight office. While he sat there waiting Corinne walked upstairs.

Ronald did not offer to help the freight men drag the box outside. When they had gone he went into the den and came back with the pumpkin. He opened the back door and hurled it out into the rain. It cleared the back fence and rolled down the alley stopping in a small puddle in the cinders.

After a while the water level reached the mouth and there was a soft choking sound. The boy who found it the next morning looked at the mouth and wondered why anyone would carve such a sad Jack-O'-Lantern.



SCIENCE BRIEFS

One Mystery—Still Unsolved

COsmic rays—which consist of protons, positrons, mesons and heavy nuclei—are particles that are speeded up in space to velocities that almost equal the speed of light. These tiny pieces hit the Earth constantly at tremendous energies that are millions of times greater than scientists can obtain with even the most modern types of equipment.

Despite the consistent and concentrated study being made by scientists, cosmic rays remain a mystery. How they accelerate to their tremendous speeds—their nature and where they come from and their purpose—these are still unknown.

The cosmic rays that shoot in from space are called primary radiation, and these hardly ever penetrate Earth's atmosphere to sea level. They usually hit atoms of gases that make up the air, invariably smashing the atom and sending its particles—which are called secondary cosmic rays—off in many different directions.

Actually, in order to make a complete study of the primary cosmic rays under perfect conditions,

we should have a laboratory at least 23 miles above Earth. That's about where the original particles can be found. But since that isn't possible—at this time anyway—Navy scientists send up balloons containing various sensitive equipment. Then, the primary rays shoot into the equipment leaving tracks on the photographic plates for later correlation by the scientists. Other equipment radios data to the men on the ground when a cosmic ray is detected.

Rockets which can be sent that distance into the atmosphere don't serve the purpose because they can't stay up very long, and this type of project requires high altitudes for hours. Balloons, for this reason, have been found to bring much more successful results.

With continued research and study, the mystery of the cosmic ray will undoubtedly unfold and science will be able to build the solution into another advance for the good of humanity.

We Should Have Stayed Prehistoric

A STUDY MADE of domestic rats and wild rats of the same family indicates a definite pattern of physiological and behavior differences between the two types. Which would lead to the idea that these same types of differences possibly exist between early prehistoric man and civilized man as we know him today.

Man was probably made much more susceptible to various diseases by the very process of becoming

civilized. Illnesses like certain forms of colitis, asthma, rheumatoid arthritis, some forms of cancer, some types of mental illnesses—all these may be the products that developed as the civilization grew.

Quite possibly, as man developed from the state of a hard-fighting primitive to that of a domestic secure individual, certain changes happened to his adrenal glands and his sex glands which could have been great enough to make him an easier victim to certain types of ailments.

Maybe he should have stayed a healthy prehistoric . . .

Youth for the Old

TWO BRITISH scientists have recently performed some experiments the results of which are worthy of noting. They removed some skin from the ear of a rabbit and impregnated it with glycerine. Then they froze it and kept it stored for four months, after which time they transplanted the skin and found it would grow normally.

According to the two scientists—Dr. R. Billingham and Prof. I. Bedawar—it is not too far-fetched to assume that these pieces of skin would have remained in storage, in perfect condition, for a period much longer than the normal expected life span of their donor.

If this is so, then the aches and pains of old age will soon be over—the possibility of perpetuating youth is probable. A man might store, for example, some pieces of his own arteries and veins. In his old age, when he is suffering from

hardening of the arteries, all he'd have to do would be to replace some of his hardened arteries with those belonging to his youth.

And, for the vain, no more wrinkled skin! Just store some tissues when you're 20, pick them up and let them grow again with you when you're 50.

It's an interesting possibility.

The freeze method, incidentally, is an acknowledged advantage over the fresh bank method since it has been found that freeze grafts heal faster and there is less danger of hemorrhaging. The frozen graft retains its potency.

Man Makes Himself Deaf

HERE IS no sound in nature that will do any damage to the ear drums of a human. But man has set out to master nature. And in his efforts to do so, he exposes the human ear to degrees of sound for which it was never intended, and against which it has no protection.

In industry, the excessive noises of the machinery with which the worker is associated eight hours of the day create an injury to the hearing organ. The explosions of grenades and gunfire, the violent sounds made by airplane motors and jet engines and all the other instruments of warfare, all contribute their share. Even day-to-day city life as we know it contains an unnatural amount of loud and violent noise.

In his effort to become master, man is slowly destroying bits of himself.

—Peter Dakin

The line between noble dreams and madness is thin, and loneliness can push men past it

the lonely ones

By Edward W. Ludwig

Illustrated by PAUL ORBAN

ONWARD SPED the *Wanderer*, onward through cold, silent infinity, on and on, an insignificant pencil of silver lost in the terrible, brooding blackness.

But even more awful than the blackness was the loneliness of the six men who inhabited the silver rocket. They moved in loneliness as fish move in water. Their lives revolved in loneliness as planets revolve in space and time. They bore their loneliness like a shroud, and it was as much a part of them as sight in their eyes. Loneliness was both their brother and their god.

Yet, like a tiny flame in the darkness, there was hope, a savage, desperate hope that grew with the passing of each day, each month, and each year.

And at last . . .

"Lord," breathed Captain Sam Wiley.

Lieutenant Gunderson nodded. "It's a big one, isn't it?"

"It's a big one," repeated Captain Wiley.

They stared at the image in the *Wanderer's* forward visi-screen, at the great, shining gray ball. They stared hard, for it was like an enchanted, God-given fruit handed them on a star-flecked platter of midnight. It was like the answer to a thousand prayers, a shining symbol of hope which could mean the end of loneliness.

"It's ten times as big as Earth," mused Lieutenant Gunderson. "Do you think this'll be it, Captain?"

"I'm afraid to think."

A thoughtful silence.

"Captain."

"Yes?"

"Do you hear my heart pounding?"

Captain Wiley smiled. "No. No, of course not."

"It seems like everybody should be hearing it. But we shouldn't get excited, should we? We mustn't



hope too hard." He bit his lip. "But there *should* be life there, don't you think, Captain?"

"There may be."

"Nine years, Captain. Think of it. It's taken us nine years to get here. There's *got* to be life."

"Prepare for deceleration, Lieutenant."

Lieutenant Gunderson's tall, slim body sagged for an instant. Then his eyes brightened.

"Yes, sir!"

CAPTAIN SAM WILEY continued to stare at the beautiful gray globe in the visi-screen. He was not like Gunderson, with boyish eagerness and anxiety flowing out of him in a ceaseless babble. His emotion was as great, or greater, but it was imprisoned within him, like swirling, foaming liquid inside a corked jug.

It wouldn't do to encourage the men too much. Because, if they were disappointed . . .

He shook his silver-thatched head. There it was, he thought. A new world. A world that, perhaps, held life.

Life. It was a word uttered only with reverence, for throughout the Solar System, with the exception of on Earth, there had been only death.

First it was the Moon, airless and lifeless. That had been expected, of course.

But Mars. For centuries men had dreamed of Mars and written of Mars with its canals and dead cities, with its ancient men and strange animals. Everyone *knew* there was or had been life on Mars.

The flaming rockets reached Mars, and the canals became volcanic crevices, and the dead cities became jagged peaks of red stone, and the endless sands were smooth, smooth, smooth, untouched by feet of living creatures. There was plant-life, a species of green-red lichen in the Polar regions. But nowhere was there real life.

Then Venus, with its dust and wind. No life there. Not even the stars to make one think of home. Only the dust and wind, a dark veil of death screaming eternally over hot dry land.

And Jupiter, with its seas of ice; and hot Mercury, a cracked, withered mummy of a planet, baked as hard and dry as an ancient walnut in a furnace.

Next, the airless, rocky asteroids, and frozen Saturn with its swirling ammonia snows. And last, the white, silent worlds, Uranus, Neptune, and Pluto.

World after world, all dead, with no sign of life, no reminder of life, and no promise of life.

Thus the loneliness had grown. It was not a child of Earth. It was not born in the hearts of those who scurried along city pavements or of those in the green fields or of those in the cool, clean houses.

It was a child of the incredible distances, of the infinite night, of emptiness and silence. It was born in the hearts of the slit-eyed men, the oldish young men, the spacemen.

For without life on other worlds, where was the sky's challenge? Why go on and on to discover only worlds of death?

The dream of the spacemen

turned from the planets to the stars. Somewhere in the galaxy or in other galaxies there *had* to be life. Life was a wonderful and precious thing. It wasn't right that it should be confined to a single, tiny planet. If it were, then life would seem meaningless. Mankind would be a freak, a cosmic accident.

And now the *Wanderer* was on the first interstellar flight, hurtling through the dark spaces to Proxima Centauri. Moving silently, as if motionless, yet at a speed of 160,000 miles a second. And ahead loomed the great, gray planet, the only planet of the sun, growing larger, larger, each instant. . . .

A GENTLE, murmuring hum filled the ship. The indicator lights on the control panel glowed like a swarm of pink eyes.

"Deceleration compensator adjusted for 12 G's, sir," reported Lieutenant Gunderson.

Captain Wiley nodded, still studying the image of the planet.

"There—there's something else, Captain."

"Yes?"

"It's Brown, sir. He's drunk."

Captain Wiley turned, a scowl on his hard, lined face. "Drunk? Where'd he get the stuff?"

"He saved it, sir, saved it for nine years. Said he was going to drink it when we discovered life."

"We haven't discovered life yet."

"I know. He said he wouldn't set foot on the planet if he was sober. Said if there isn't life there, he couldn't take it—unless he was drunk."

Captain Wiley grunted. "All right."

They looked at the world.

"Wouldn't it be wonderful, Captain? Just think—to meet another race. It wouldn't matter what they were like, would it? If they were primitive, we could teach them things. If they were ahead of us, they could teach us. You know what I'd like? To have someone meet us, to gather around us. It wouldn't matter if they were afraid of us or even if they tried to kill us. We'd know that we aren't alone."

"I know what you mean," said Captain Wiley. Some of his emotion overflowed the prison of his body. "There's no thrill in landing on dead worlds. If no one's there to see you, you don't feel like a hero."

"That's it, Captain! That's why I came on this crazy trip. I guess that's why we all came. I . . ."

Captain Wiley cleared his throat. "Lieutenant, commence deceleration. 6 G's."

"Yes, sir!"

The planet grew bigger, filling the entire visi-screen.

Someone coughed behind Captain Wiley.

"Sir, the men would like to look at the screen. They can't see the planet out of the ports yet." The speaker was Doyle, the ship's Engineer, a dry, tight-skinned little man.

"Sure." Captain Wiley stepped aside.

Doyle looked, then Parker and Fong. Just three of them, for Watkins had sliced his wrists the fourth year out. And Brown was drunk.

As they looked, a realization came to Captain Wiley. The men

were getting old. The years had passed so gradually that he'd never really noticed it before. Lieutenant Gunderson had been a kid just out of Space Academy. Parker and Doyle and Fong, too, had been in their twenties. They had been boys. And now something was gone—the sharp eyes and sure movements of youth, the smooth skin and thick, soft hair.

Now they had become men. And yet for a few moments, as they gazed at the screen, they seemed like happy, expectant children.

"I wish Brown could see this," Doyle murmured. "He says now he isn't going to get off his couch till we land and discover life. Says he won't dare look for himself."

"The planet's right for life," said Fong, the dark-faced astro-physicist. "Atmosphere forty per cent oxygen, lots of water vapor. No poisonous gases, according to spectroscopic analyses. It should be ideal for life."

"There is life there," said Parker, the radarman. "You know why? Because we've given up eighteen years of our lives. Nine years to get here, nine to get back. I'm thirty now. I was twenty-one when we left Earth. I gave up all those good years. They say that you can have something if you pay enough for it. Well, we've paid for this. There has to be a—a sort of universal justice. That's why I know there's life here, life that moves and thinks—maybe even life we can talk to."

"You need a drink," said Fong.

"It's getting bigger," murmured Lieutenant Gunderson.

"The Centaurians," mused Doyle, half to himself. "What'll

they be like? Monsters or men? If Parker's right about universal justice, they'll be men."

"Hey, where there's men, there's women!" yelled Parker. "A Centaurian woman! Say!"

"Look at those clouds!" exclaimed Doyle. "Damn it, we can't see the surface."

"Hey, there! Look there, to the right! See it? It's silver, down in a hole in the clouds. It's like a city!"

"Maybe it's just water."

"No, it's a city!"

"Bring 'er down, Captain. God, Captain, bring 'er down fast!"

"Drag Brown in here! He ought to see this!"

"Can't you bring 'er down faster, Captain?"

"Damn it, it is a city!"

"Why doesn't someone get Brown?"

"Take to your couches, men," said Captain Wiley. "Landing's apt to be a bit bumpy. Better strap yourselves in."

DOWN WENT the rocket, more slowly now, great plumes of scarlet thundering from its forward braking jets. Down, down into soft, cotton-like clouds, the whiteness sliding silently past the ports.

Suddenly, a droning voice:

"To those in the ship from the planet called Earth: Please refrain from landing at this moment. You will await landing instructions."

Parker leaped off his couch, grasping a stanchion for support. "That voice! It was human!"

Captain Wiley's trembling hand moved over the jet-control panel. The ship slowed in its descent. The

clouds outside the portholes became motionless, a milky whiteness pressed against the ship.

"The voice!" Parker cried again. "Am I crazy? Did everyone hear it?"

Captain Wiley turned away from the panel. "We heard it, Parker. It was in our minds. Telepathy."

He smiled. "Yes, the planet is inhabited. There are intelligent beings on it. Perhaps they're more intelligent than we are."

It was strange. The men had hoped, dreamed, prayed for this moment. Now they sat stunned, unable to comprehend, their tongues frozen.

"We'll see them very soon," said Captain Wiley, his voice quivering. "We'll wait for their directions."

Breathlessly, they waited.

Captain Wiley's fingers drummed nervously on the base of the control panel. Lieutenant Gunderson rose from his couch, stood in the center of the cabin, then returned to his couch.

Silence, save for the constant, rumbling roar of the jets which held the ship aloft.

"I wonder how long it'll be," murmured Fong at last.

"It seems like a long time!" burst Parker.

"We've waited nine years," said Captain Wiley. "We can wait a few more minutes."

They waited.

"Good Lord!" said Parker. "How long is it going to be? What time is it? We've been waiting an hour! What kind of people are they down there?"

"Maybe they've forgotten about us," said Fong.

"That's it!" cried Parker. "They've forgotten about us! Hey, you! Down there—you that talked to us! We're still here, damn it! We want to land!"

"Parker," said Captain Wiley, sternly.

Parker sat down on his couch, his lips quivering.

Then came the voice:

"We regret that a landing is impossible at this moment. Our field is overcrowded, and your vessel is without priority. You must wait your turn."

Captain Wiley stared forward at nothing. "Whoever you are," he whispered, "please understand that we have come a long way to reach your planet. Our trip . . ."

"We do not wish to discuss your trip. You will be notified when landing space is available."

Captain Wiley's body shook. "Wait, tell us who you are. What do you look like? Tell us . . ."

"Talking to you is quite difficult. We must form our thoughts so as to form word-patterns in your minds. You will be notified."

"Wait a minute!" called Captain Wiley.

No answer.

Captain Wiley straightened in an effort to maintain dignity.

They waited. . . .

IT WAS NIGHT.

The darkness was an impenetrable blanket, a solid thing, like thick black velvet glued over the ports. It was worse than the darkness of space.

Captain Wiley sat before the control panel, slowly beating his

fists against the arms of his chair, a human metronome ticking off the slow seconds.

Parker stood before a porthole.

"Hey, look, Captain! There's a streak of red, like a meteor. And there's another!"

Captain Wiley rose, looked out. "They're rockets. They're going to land. These people are highly advanced."

His face became grim. Below them lay a planet, an intelligent race hidden beneath clouds and darkness. What manner of creatures were they? How great was their civilization? What marvelous secrets had their scientists discovered? What was their food like, their women, their whiskey?

The questions darted endlessly through his mind like teasing needle-points. All these wondrous things lay below them, and here they sat, like starving men, their hands tied, gazing upon a steaming but unobtainable dinner. So near and yet so far.

He trembled. The emotion grew within him until it burst out as water bursts through the cracked wall of a dam. He became like Parker.

"Why should we wait?" he yelled. "Why must we land in their field? Parker! Prepare to release flares! We're going down! We'll land anywhere—in a street, in the country. We don't have to wait for orders!"

Parker bounced off his couch. Someone called, "Brown, we're going to land!"

A scurrying of feet, the rush of taut-muscled bodies, the babble of excited voices.

"We're going down!"

"We're going down!"

The grumble of the *Wanderer's* jets loudened, softened, spluttered, loudened again. Vibration filled the ship as it sank downward.

Suddenly it lurched upward, like a child's ball caught in a stream of rising water. The jolt staggered the men. They seized stanchions and bulkhead railings to keep their balance.

"What the hell?"

Abruptly, the strange movement ceased. The ship seemed motionless. There was no vibration.

"Captain," said Lieutenant Gunderson. "There's no change in altitude. We're still at 35,000 feet, no more, no less."

"We *must* be going down," said Captain Wiley, puzzled. "Kill jets 4 and 6."

The Lieutenant's hands flicked off two switches. A moment later: "There's no change, Captain."

Then came the voice:

"To those in the vessel from the planet Earth: Please do not oppose orders of the Landing Council. You are the first visitors in the history of our world whom we have had to restrain with physical force. You will be notified when landing space is available."

M ORNING.

The warm sunlight streamed into the clouds, washing away the last shadows and filtering through the portholes.

The men breakfasted, bathed, shaved, smoked, sat, twisted their fingers, looked out the ports. They were silent men, with dark shadows about their eyes and with tight,

white-lipped mouths.

Frequently, the clouds near them were cut by swift, dark shapes swooping downward. The shapes were indistinct in the cotton-like whiteness, but obviously they were huge, like a dozen *Wanderers* made into one.

"Those ships are big," someone murmured, without enthusiasm.

"It's a busy spaceport," grumbled Captain Wiley.

Thoughts, words, movements came so slowly it was like walking under water. Enthusiasm was dead. The men were automatons, sitting, waiting, eating, sitting, waiting.

A day passed, and a night.

"Maybe they've forgotten us," said Fong.

No one answered. The thought had been voiced before, a hundred times.

Then, at last, the droning words:

"To those in the vessel from the planet Earth: You will now land. We will carry you directly over the field. Then you will descend straight down. The atmosphere is suitable to your type of life and is free of germs. You will not need protection."

The men stared at one another.

"Hey," Doyle said, "did you hear that? He says we can go down."

The men blinked. Captain Wiley swallowed hard. He rose with a stiff, slow, nervous hesitancy.

"We're going down," he mumbled, as if repeating the words over and over in his mind and trying to believe them.

The men stirred as realization sprouted and grew. They stirred like lethargic animals aroused from

the long, dreamless sleep of hibernation.

"We're going to land," breathed Parker, unbelievingly.

The *Wanderer* moved as though caught in the grip of a giant, invisible hand.

The voice said:

"You may now descend."

Captain Wiley moved to the jet-control panel. "Lieutenant!" he snapped. "Wake up. Let's go!"

The ship sank downward through the thick sea of clouds. The men walked to the ports. A tenseness, an excitement grew in their faces, like dying flame being fanned into its former brilliancy.

Out of the clouds loomed monstrous, shining, silver spires and towers, Cyclopean bridges, gigantic lake-like mirrors, immense golden spheres. It was a nightmare world, a jungle of fantastic shape and color.

The men gasped, whispered, murmured, the flame of their excitement growing, growing.

"The whole planet is a city!" breathed Parker.

T H U M P !

The *Wanderer* came to rest on a broad landing field of light blue stone. The jets coughed, spluttered, died. The ship quivered, then lay still, its interior charged with an electric, pregnant silence.

"You first, Captain." Lieutenant Gunderson's voice cracked, and his face was flushed. "You be the first to go outside."

Captain Wiley stepped through the airlock, his heart pounding. It was over now—all the bewilder-

ment, the numbness.

And his eyes were shining. He'd waited so long that it was hard to believe the waiting was over. But it was, he told himself. The journey was over, and the waiting, and now the loneliness would soon be over. Mankind was not alone. It was a good universe after all!

He stepped outside, followed by Lieutenant Gunderson, then by Parker, Doyle and Fong.

He rubbed his eyes. This couldn't be! A world like this couldn't exist! He shook his head, blinked furiously.

"It—it can't be true," he mumbled to Lieutenant Gunderson. "We're still on the ship—dreaming."

The landing field was huge, perhaps ten miles across, and its sides were lined with incredible ships, the smallest of which seemed forty times as large as the *Wanderer*. There were silver ships, golden ships, black ships, round ships, transparent ships, cigar-shaped ships, flat-topped ships.

And scattered over the field were—creatures.

A few were the size of men, but most were giants by comparison. Some were humanoid, some reptilian. Some were naked, some clad in helmeted suits, some enveloped with a shimmering, water-like luminescence. The creatures walked, slithered, floated, crawled.

Beyond the ships and the field lay the great city, its web-work of towers, minarets, spheres and bridges like the peaks of an enormous mountain range stretching up into space itself. The structures were like the colors of a rainbow mixed

in a cosmic paint pot, molded and solidified into fantastic shapes by a mad god.

"I—I'm going back to the ship," stammered Parker. The whiteness of death was in his face. "I'm going to stay with Brown."

He turned, and then he screamed.

"Captain, the ship's moving!"

Silently, the *Wanderer* was drifting to the side of the field.

The toneless voice said:

"We are removing your vessel so that other descending ships will not damage it."

Captain Wiley shouted into the air. "Wait! Don't go away! Help us! Where can we see you?"

The voice seemed to hesitate. "It is difficult for us to speak in thoughts that you understand."

SILENCE.

Captain Wiley studied the faces of his men. They were not faces of conquerors or of triumphant spacemen. They were the faces of dazed, frightened children who had caught a glimpse of Hell. He attempted, feebly, to smile.

"All right," he said loudly, "so it isn't like we expected. So no one came to meet us with brass bands and ten cent flags. We've still succeeded, haven't we? We've found life that's intelligent beyond our comprehension. What if our own civilization is insignificant by comparison? Look at those beings. Think of what we can learn from them. Why, their ships might have exceeded the speed of light. They might be from other galaxies!"

"Let's find out," said Parker.

They strode to the nearest ship, an immense, smooth, bluish sphere. Two creatures stood before it, shaped like men and yet twice the size of men. They wore white, skin-tight garments that revealed muscular bodies like those of gods.

The looked at Captain Wiley and smiled.

One of them pointed toward the *Wanderer*. Their smiles widened and then they laughed.

They laughed gently, understandingly, but they *laughed*.

And then they turned away.

"Talk to them," Parker urged.

"How?" Beads of perspiration shone on Captain Wiley's face.

"Any way. Go ahead."

Captain Wiley wiped his forehead. "We are from Earth, the third planet . . ."

The two god-like men seemed annoyed. They walked away, ignoring the Earthmen.

Captain Wiley spat. "All right, so they won't talk to us. Look at that city! Think of the things we can see there and tell the folks on Earth about! Why, we'll be heroes!"

"Let's go," said Parker, his voice quavering around the edges.

They walked toward a large, oval opening in a side of the field, a hole between mountainous, conical structures that seemed like the entrance to a street.

Suddenly breath exploded from Captain Wiley's lungs. His body jerked back. He fell to the blue stone pavement.

Then he scrambled erect, scowling, his hands outstretched. He felt a soft, rubbery, invisible substance.

"It's a wall!" he exclaimed.

The voice droned:

"To those of Earth: Beings under the 4th stage of Galactic Development are restricted to the area of the landing field. We are sorry. In your primitive stage it would be unwise for you to learn the nature of our civilization. Knowledge of our science would be abused by your people, and used for the thing you call war. We hope that you have been inspired by what you have seen. However, neither we nor the other visitors to our planet are permitted to hold contact with you. It is suggested that you and your vessel depart."

"Listen, you!" screamed Parker. "We've been nine years getting here! By Heaven, we won't leave now! We're . . ."

"We have no time to discuss the matter. Beings under the 4th stage of Galactic . . ."

"Never mind!" spat Captain Wiley.

Madness flamed in Parker's eyes. "We won't go! I tell you, we won't, we won't!"

His fists streaked through the air as if at an invisible enemy. He ran toward the wall.

He collided with a jolt that sent him staggering backward, crying, sobbing, screaming, all at once.

Captain Wiley stepped forward, struck him on the chin. Parker crumpled.

They stood looking at his body, which lay motionless except for the slow rising and falling of his chest.

"What now, Captain?" asked Lieutenant Gunderson.

Captain Wiley thought for a few seconds.

Then he said, "We're ignorant country bumpkins, Lieutenant, rid-

ing into the city in a chugging jalopy. We're stupid savages, trying to discuss the making of fire with the creators of atomic energy. We're children racing a paper glider against an atomic-powered jet. We're too ridiculous to be noticed. We're tolerated — but nothing more."

"Shall we go home?" asked Fong, a weariness in his voice.

Lieutenant Gunderson scratched his neck. "I don't think I'd want to go home now. Could you bear to tell the truth about what happened?"

Fong looked wistfully at the shining city. "If we told the truth, they probably wouldn't believe us. We've failed. It sounds crazy. We reached *Proxima Centauri* and found life, and yet somehow we failed. No, I wouldn't like to go home."

"Still, we learned something," said Doyle. "We know now that there is life on worlds beside our own. Somewhere there must be other races like ours."

They looked at each other, strangely, for a long, long moment.

At last Lieutenant Gunderson asked, "How far is *Alpha Centauri*?"

Captain Wiley frowned. "*Alpha Centauri*?" Through his mind swirled chaotic visions of colossal distances, eternal night, and lonely

years. He sought hard to find a seed of hope in his mind, and yet there was no seed. There were only a coldness and an emptiness.

Suddenly, the voice:

"Yes, Men of Earth, we suggest that you try *Alpha Centauri*."

The men stood silent and numb, like bewildered children, as the implication of those incredible words sifted into their consciousness.

Finally Fong said, "Did—did you hear that? He said . . ."

Captain Sam Wiley nodded, very slowly. "Yes. *Alpha Centauri. Alpha Centauri.*"

His eyes began to twinkle, and then he smiled. . . .

ONWARD sped the *Wanderer*, onward through cold, silent infinity, on and on, an insignificant pencil of silver lost in the terrible, brooding blackness.

Yet even greater than the blackness was the flaming hope in the six men who inhabited the silver rocket. They moved in hope as fish move in water. Their lives revolved in hope as planets revolve in space and time. They bore their hope like a jeweled crown, and it was as much a part of them as sight in their eyes. Hope was both their brother and their god.

And there was no loneliness.

Progress is relative; Senator O'Noonan's idea of it was not particularly scientific. Which would be too bad, if he had the last word!

Progress Report

By Mark Clifton and Alex Apostolides

Illustrated by PAUL ORBAN

IT SEEMED to Colonel Jennings that the air conditioning unit merely washed the hot air around him without lowering the temperature from that outside. He knew it was partly psychosomatic, compounded of the view of the silvery spire of the test ship through the heatwaves of the Nevada landscape and the knowledge that this was the day, the hour, and the minutes.

The final test was at hand. The instrument ship was to be sent out into space, controlled from this sunken concrete bunker, to find out if the flimsy bodies of men could endure there.

Jennings visualized other bunkers scattered through the area, observation posts, and farther away the field headquarters with open telephone lines to the Pentagon, and beyond that a world waiting for news of the test—and not everyone wishing it well.

The monotonous buzz of the field

phone pulled him away from his fascinated gaze at the periscope slit. He glanced at his two assistants, Professor Stein and Major Eddy. They were seated in front of their control boards, staring at the blank eyes of their radar screens, patiently enduring the beads of sweat on their faces and necks and hands, the odor of it arising from their bodies. They too were feeling the moment. He picked up the phone.

"Jennings," he said crisply.

"Zero minus one half hour, Colonel. We start alert count in fifteen minutes."

"Right," Colonel Jennings spoke softly, showing none of the excitement he felt. He replaced the field phone on its hook and spoke to the two men in front of him.

"This is it. Apparently this time we'll go through with it."

Major Eddy's shoulders hunched a trifle, as if he were getting set to have a load placed upon them.



Professor Stein gave no indication that he had heard. His thin body was stooped over his instrument bank, intense, alert, as if he were a runner crouched at the starting mark, as if he were young again.

Colonel Jennings walked over to the periscope slit again and peered through the shimmer of heat to where the silvery ship lay arrowed in her cradle. The last few moments of waiting, with a brassy taste in his mouth, with the vision of the test ship before him; these were the worst.

Everything had been done, checked and rechecked hours and days ago. He found himself wishing there were some little thing, some desperate little error which must be corrected hurriedly, just something to break the tension of waiting.

"You're all right, Sam, Prof?" he asked the major and professor unnecessarily.

"A little nervous," Major Eddy answered without moving.

"Of course," Professor Stein said. There was a too heavy stress on the silibant sound, as if the last traces of accent had not yet been removed.

"I expect everyone is nervous, not just the hundreds involved in this, but everywhere," Jennings commented. And then ruefully, "Except Professor Stein there. I thought surely I'd see some nerves at this point, Prof." He was attempting to make light conversation, something to break the strain of mounting buck fever.

"If I let even one nerve tendril slack, Colonel, I would go to pieces entirely," Stein said precisely, in the

way a man speaks who has learned the language from text books. "So I do not think of our ship at all. I think of mankind. I wonder if mankind is as ready as our ship. I wonder if man will do any better on the planets than he has done here."

"Well, of course," Colonel Jennings answered with sympathy in his voice, "under Hitler and all the things you went through, I don't blame you for being a little bitter. But not all mankind is like that, you know. As long as you've been in our country, Professor, you've never looked around you. You've been working on this, never lifting your head"

HE JERKED in annoyance as a red light blinked over the emergency circuit, and a buzzing, sharp and repeated, broke into this moment when he felt he was actually reaching, touching Stein, as no one had before.

He dragged the phone toward him and began speaking angrily into its mouthpiece before he had brought it to his lips.

"What the hell's the matter now? They're not going to call it off again! Three times now, and"

He broke off and frowned as the crackling voice came through the receiver, the vein on his temple pulsing in his stress.

"I beg your pardon, General," he said, much more quietly.

The two men turned from their radar scopes and watched him questioningly. He shrugged his shoulders, an indication to them of his helplessness.

"You're not going to like this,

Jim," the general was saying. "But it's orders from Pentagon. Are you familiar with Senator O'Noonan?"

"Vaguely," Jennings answered.

"You'll be more familiar with him, Jim. He's been newly appointed chairman of the appropriations committee covering our work. And he's fought it bitterly from the beginning. He's tried every way he could to scrap the entire project. When we've finished this test, Jim, we'll have used up our appropriations to date. Whether we get any more depends on him."

"Yes, sir?" Jennings spoke questioningly. Political maneuvering was not his problem, that was between Pentagon and Congress.

"We must have his support, Jim," the general explained. "Pentagon hasn't been able to win him over. He's stubborn and violent in his reactions. The fact it keeps him in the headlines—well, of course that wouldn't have any bearing. So Pentagon invited him to come to the field here to watch the test, hoping that would win him over." The general hesitated, then continued.

"I've gone a step farther. I felt if he was actually at the center of control, your operation, he might be won over. If he could actually participate, press the activating key or something, if the headlines could show he was working with us, actually sent the test ship on its flight. . . ."

"General, you can't," Jennings moaned. He forgot rank, everything.

"I've already done it, Jim," the general chose to ignore the outburst. "He's due there now. I'll look

to you to handle it. He's got to be won over, Colonel. It's your project." Considering the years that he and the general had worked together, the warm accord and informality between them, the use of Jennings' title made it an order.

"Yes, sir," he said.

"Over," said the general formally.

"Out," whispered Jennings.

The two men looked at him questioningly.

"It seems," he answered their look, "we are to have an observer. Senator O'Noonan."

"Even in Germany," Professor Stein said quietly, "they knew enough to leave us alone at a critical moment."

"He can't do it, Jim," Major Eddy looked at Jennings with pleading eyes.

"Oh, but he can," Jennings answered bitterly. "Orders. And you know what orders are, don't you, Major?"

"Yes, sir," Major Eddy said stiffly.

Professor Stein smiled ruefully.

Both of them turned back to their instrument boards, their radar screens, to the protective obscurity of subordinates carrying out an assignment. They were no longer three men coming close together, almost understanding one another in this moment of waiting, when the world and all in it had been shut away, and nothing real existed except the silvery spire out there on the desert and the life of it in the controls at their fingertips.

"Beep, minus fifteen minutes!" the first time signal sounded.

COLONEL JENNINGS, sir!" The senator appeared in the low doorway and extended a fleshy hand. His voice was hearty, but there was no warmth behind his tones. He paused on the threshold, bulky, impressive, as if he were about to deliver an address. But Jennings, while shaking hands, drew him into the bunker, pointedly, causing the senator to raise bushy eyebrows and stare at him speculatively.

"At this point everything runs on a split second basis, Senator," he said crisply. "Ceremony comes after the test." His implication was that when the work was done, the senator could have his turn in the limelight, take all the credit, turn it into political fodder to be thrown to the people. But because the man was chairman of the appropriations committee, he softened his abruptness. "If the timing is off even a small fraction, Senator, we would have to scrap the flight and start all over."

"At additional expense, no doubt." The senator could also be crisp. "Surprises me that the military should think of that, however."

The closing of the heavy doors behind him punctuated his remark and caused him to step to the center of the bunker. Where there had seemed adequate room before, now the feeling was one of oppressive overcrowding.

Unconsciously, Major Eddy squared his elbows as if to clear the space around him for the manipulation of his controls. Professor Stein sat at his radar screen, quiet, immobile, a part of the mechanisms. He was accustomed to over-

bearing authority whatever political tag it might wear at the moment.

"Beep. Eleven minutes," the signal sounded.

"Perhaps you'll be good enough to brief me on just what you're doing here?" the senator asked, and implied by the tone of his voice that it couldn't be very much. "In layman's language, Colonel. Don't try to make it impressive with technical obscurities. I want my progress report on this project to be understandable to everyone."

Jennings looked at him in dismay. Was the man kidding him? Explain the zenith of science, the culmination of the dreams of man in twenty simple words or less! And about ten minutes to win over a man which the Pentagon had failed to win.

"Perhaps you'd like to sit here, Senator," he said courteously. "When we learned you were coming, we felt yours should be the honor. At zero time, you press this key—here. It will be your hand which sends the test ship out into space."

Apparently they were safe. The senator knew so little, he did not realize the automatic switch would close with the zero time signal, that no hand could be trusted to press the key at precisely the right time, that the senator's key was a dummy.

"Beep, ten," the signal came through.

Jennings went back over to the periscope and peered through the slit. He felt strangely surprised to see the silver column of the ship still there. The calm, the scientific detachment, the warm thrill of co-

ordinated effort, all were gone. He felt as if the test flight itself was secondary to what the senator thought about it, what he would say in his progress report.

He wondered if the senator's progress report would compare in any particular with the one on the ship. That was a chart, representing as far as they could tell, the minimum and maximum tolerances of human life. If the multiple needles, tracing their continuous lines, went over the black boundaries of tolerances, human beings would die at that point. Such a progress report, showing the life-sustaining conditions at each point throughout the ship's flight, would have some meaning. He wondered what meaning the senator's progress report would have.

He felt himself being pushed aside from the periscope. There was no ungentleness in the push, simply the determined pressure of an arrogant man who was accustomed to being in the center of things, and thinking nothing of shoving to get there. The senator gave him the briefest of explanatory looks, and placed his own eye at the periscope slit.

"Beep, nine," the signal sounded.

"So that's what represents two billion dollars," the senator said contemptuously. "That little sliver of metal."

"The two billion dollar atomic bomb was even smaller," Jennings said quietly.

THE SENATOR took his eye away from the periscope briefly and looked at Jennings speculatively.

"The story of where all that money went still hasn't been told," he said pointedly. "But the story of who got away with this two billion will be different."

Colonel Jennings said nothing. The white hot rage mounting within him made it impossible for him to speak.

The senator straightened up and walked back over to his chair. He waved a hand in the direction of Major Eddy.

"What does that man do?" he asked, as if the major were not present, or was unable to comprehend.

"Major Eddy," Jennings found control of his voice, "operates remote control." He was trying to reduce the vast complexity of the operation to the simplest possible language.

"Beep, eight," the signal interrupted him.

"He will guide the ship throughout its entire flight, just as if he were sitting in it."

"Why isn't he sitting in it?" the senator asked.

"That's what the test is for, Senator." Jennings felt his voice becoming icy. "We don't know if space will permit human life. We don't know what's out there."

"Best way to find out is for a man to go out there and see," the senator commented shortly. "I want to find out something, I go look at it myself. I don't depend on charts and graphs, and folderol."

The major did not even hunch his broad shoulders, a characteristic gesture, to show that he had heard, to show that he wished the senator was out there in untested space.

"What about him? He's not even in uniform!"

"Professor Stein maintains sight contact on the scope and transmits the IFF pulse."

The senator's eyes flashed again beneath heavy brows. His lips indicated what he thought of professors and projects who used them.

"What's IFF?" he asked.

The colonel looked at him incredulously. It was on the tip of his tongue to ask where the man had been during the war. He decided he'd better not ask it. He might learn.

"It stands for Identification—Friend or Foe, Senator. It's army jargon."

"Beep, seven."

Seven minutes, Jennings thought, and here I am trying to explain the culmination of the entire science of all mankind to a lardbrain in simple kindergarten words. Well, he'd wished there was something to break the tension of the last half hour, keep him occupied. He had it.

"You mean the army wouldn't know, after the ship got up, whether it was ours or the enemy's?" the senator asked incredulously.

"There are meteors in space, Senator," Jennings said carefully. "Radar contact is all we'll have out there. The IFF mechanism reconverts our beam to a predetermined pulse, and it bounces back to us in a different pattern. That's the only way we'd know if we were still on the ship, or have by chance fastened on to a meteor."

"What has that got to do with the enemy?" O'Noonan asked uncomprehendingly.

Jennings sighed, almost audibly.

"The mechanism was developed during the war, when we didn't know which planes were ours and which the enemy's. We've simply adapted it to this use—to save money, Senator."

"Humph!" the senator expressed his disbelief. "Too complicated. The world has grown too complicated."

"Beep, six."

The senator glanced irritably at the time speaker. It had interrupted his speech. But he chose to ignore the interruption, that was the way to handle heckling.

"I am a simple man. I come from simple parentage. I represent the simple people, the common people, the people with their feet on the ground. And the whole world needs to get back to the simple truths and honesties"

Jennings headed off the campaign speech which might appeal to the mountaineers of the senator's home state, where a man's accomplishments were judged by how far he could spit tobacco juice; it had little application in this bunker where the final test before the flight of man to the stars was being tried.

"To us, Senator," he said gently, "this ship represents simple truths and honesties. We are, at this moment, testing the truths of all that mankind has ever thought of, theorized about, believed of the space which surrounds the Earth. A farmer may hear about new methods of growing crops, but the only way he knows whether they're practical or not is to try them on his own land."

The senator looked at him im-

passively. Jennings didn't know whether he was going over or not. But he was trying.

"All that ship, and all the instruments it contains; those represent the utmost honesties of the men who worked on them. Nobody tried to bluff, to get by with shoddy workmanship, cover up ignorance. A farmer does not try to bluff his land, for the crops he gets tells the final story. Scientists, too, have simple honesty. They have to have, Senator, for the results will show them up if they don't."

THE SENATOR looked at him speculatively, and with a growing respect. Not a bad speech, that. Not a bad speech at all. If this tomfoolery actually worked, and it might, that could be the approach in selling it to his constituents. By implication, he could take full credit, put over the impression that it was he who had stood over the scientists making sure they were as honest and simple as the mountain farmers. Many a man has gone into the White House with less.

"Beep, five."

Five more minutes. The sudden thought occurred to O'Noonan: what if he refused to press the dummy key? Refused to take part in this project he called tomfoolery? Perhaps they thought they were being clever in having him take part in the ship's launching, and were by that act committing him to something

"This is the final test, Senator. After this one, if it is right, man leaps to the stars!" It was Jennings' plea, his final attempt to

catch the senator up in the fire and the dream.

"And then more yapping colonists wanting statehood," the senator said dryly. "Upsetting the balance of power. Changing things."

Jennings was silent.

"Beep, four."

"More imports trying to get into our country duty-free," O'Noonan went on. "Upsetting our economy."

His vision was of lobbyists threatening to cut off contributions if their own industries were not kept in a favorable position. Of grim-jawed industrialists who could easily put a more tractable candidate up in his place to be elected by the free and thinking people of his state. All the best catch phrases, the semantically-loaded promises, the advertising appropriations being used by his opponent.

It was a dilemma. Should he jump on the bandwagon of advancement to the stars, hoping to catch the imagination of the voters by it? Were the voters really in favor of progress? What could this space flight put in the dinner pails of the Smiths, the Browns, the Johnsons? It was all very well to talk about the progress of mankind, but that was the only measure to be considered. Any politician knew that. And apparently no scientist knew it. Man advances only when he sees how it will help him stuff his gut.

"Beep, three." For a full minute, the senator had sat lost in speculation.

And what could he personally gain? A plan, full-formed, sprang into his mind. This whole deal could be taken out of the hands of

the military on charges of waste and corruption. It could be brought back into the control of private industry, where it belonged. He thought of vast tracts of land in his own state, tracts he could buy cheap, through dummy companies, places which could be made very suitable for the giant factories necessary to manufacture spaceships.

As chairman of the appropriations committee, it wouldn't be difficult to sway the choice of site. And all that extra employment for the people of his own state. The voters couldn't forget plain, simple, honest O'Noonan after that!

"Beep, two."

JENNINGS FELT the sweat beads increase on his forehead. His collar was already soaking wet. He had been watching the senator through two long minutes, terrible eon-consuming minutes, the impasive face showing only what the senator wanted it to show. He saw the face now soften into something approaching benignity, nobility. The head came up, the silvery hair tossed back.

"Son," he said with a ringing thrill in his voice. "Mankind much reach the stars! We must allow nothing to stop that! No personal consideration, no personal belief, nothing must stand in the way of mankind's greatest dream!"

His eyes were shrewdly watching the effect upon Jennings' face, measuring through him the effect such a speech would have upon the voters. He saw the relief spread over Jennings' face, the glow. Yes,

it might work.

"Now, son," he said with kindly tolerance, "tell me what you want me to do about pressing this key when the time comes."

"Beep, one."

And then the continuous drone while the seconds were being counted off aloud.

"Fifty-nine, fifty-eight, fifty-seven—"

The droning went on while Jennings showed the senator just how to press the dummy key down, explaining it in careful detail, and just when.

"Thirty-seven, thirty-six, thirty-five—"

"Major!" Jennings called questioningly.

"Ready, sir."

"Professor!"

"Ready, sir."

"Three, two, one, ZERO!"

"Press it, Senator!" Jennings called frantically.

Already the automatic firing stud had taken over. The bellowing, roaring flames reached down with giant strength, nudging the ship upward, seeming to hang suspended, waiting.

"Press it!"

The senator's hand pressed the dummy key. He was committed.

As if the ship had really been waiting, it lifted, faster and faster.

"Major?"

"I have it, sir." The major's hands were flying over his bank of controls, correcting the slight unbalance of thrusts, holding the ship as steady as if he were in it.

Already the ship was beyond visual sight, picking up speed. But the pip on the radar screens was

strong and clear. The drone of the IFF returning signal was equally strong.

The senator sat and waited. He had done his job. He felt it perhaps would have been better to have had the photographers on the spot, but realized the carefully directed and rehearsed pictures to be taken later would make better vote fodder.

"It's already out in space now, Senator," Jennings found a second of time to call it to the senator.

The pips and the signals were bright and clear, coming through the ionosphere, the Heaviside layer as they had been designed to do. Jennings wondered if the senator could ever be made to understand the simple honesty of scientists who had worked that out so well and true. Bright and strong and clear.

And then there was nothing! The screens were blank. The sounds were gone.

JENNINGS STOOD in stupefied silence.

"It shut! It shut off!" Major Eddy's voice was shrill in amazement.

"It cut right out, Colonel. No fade, no dying signal, just out!" It was the first time Jennings had ever heard a note of excitement in Professor Stein's voice.

The phone began to ring, loud and shrill. That would be from the General's observation post, where he, too, must have lost the signal.

The excitement penetrated the senator's rosy dream of vast acreages being sold at a huge profit, giant walls of factories going up

under his remote-control ownership. "What's wrong?" he asked. Jennings did not answer him. "What was the altitude?" he asked. The phone continued to ring, but he was not yet ready to answer it.

"Hundred fifty miles, maybe a little more," Major Eddy answered in a dull voice. "And then, nothing," he repeated incredulously. "Nothing."

The phone was one long ring now, taken off of automatic signal and rung with a hand key pressed down and held there. In a daze, Jennings picked up the phone.

"Yes, General," he answered as though he were no more than a robot. He hardly listened to the general's questions, did not need the report that every radarscope throughout the area had lost contact at the same instant. Somehow he had known that would be true, that it wasn't just his own mechanisms failing. One question did penetrate his stunned mind.

"How is the senator taking it?" the general asked finally.

"Uncomprehending, as yet," Jennings answered cryptically. "But even there it will penetrate sooner or later. We'll have to face it then."

"Yes," the general sighed. "What about safety? What if it fell on a big city, for example?"

"It had escape velocity," Jennings answered. "It would simply follow its trajectory indefinitely—which was away from Earth."

"What's happening now?" the senator asked arrogantly. He had been out of the limelight long enough, longer than was usual or necessary. He didn't like it when people went about their business as

if he were not present.

"Quiet during the test, Senator," Jennings took his mouth from the phone long enough to reprove the man gently. Apparently he got away with it, for the senator put his finger to his lips knowingly and sat back again.

"The senator's starting to ask questions?" the general asked into the phone.

"Yes, sir. It won't be long now."

"I hate to contemplate it, Jim," the general said in apprehension. "There's only one way he'll translate it. Two billion dollars shot up into the air and lost." Then sharply. "There must be something you've done, Colonel. Some mistake you've made."

THE IMPLIED accusation struck at Jennings' stomach, a heavy blow.

"That's the way it's going to be?" he stated the question, knowing its answer.

"For the good of the service," the general answered with a stock phrase. "If it is the fault of one officer and his men, we may be given another chance. If it is the failure of science itself, we won't."

"I see," the colonel answered.

"You won't be the first soldier, Colonel, to be unjustly punished to maintain public faith in the service."

"Yes, sir," Jennings answered as formally as if he were already facing court martial.

"It's back!" Major Eddy shouted in his excitement. "It's back, Colonel!"

The pip, truly, showed startlingly

clear and sharp on the radarscope, the correct signals were coming in sure and strong. As suddenly as the ship had cut out, it was back.

"It's back, General," Colonel Jennings shouted into the phone, his eyes fixed upon his own radarscope. He dropped the phone without waiting for the general's answer.

"Good," exclaimed the senator. "I was getting a little bored with nothing happening."

"Have you got control?" Jennings called to the major.

"Can't tell yet. It's coming in too fast. I'm trying to slow it. We'll know in a minute."

"You have it now," Professor Stein spoke up quietly. "It's slowing. It will be in the atmosphere soon. Slow it as much as you can."

As surely as if he were sitting in its control room, Eddy slowed the ship, easing it down into the atmosphere. The instruments recorded the results of his playing upon the bank of controls, as sound pouring from a musical instrument.

"At the take-off point?" Jennings asked. "Can you land it there?"

"Close to it," Major Eddy answered. "As close as I can."

Now the ship was in visual sight again, and they watched its nose turn in the air, turn from a bullet hurtling earthward to a ship settling to the ground on its belly. Major Eddy was playing his instrument bank as if he were the soloist in a vast orchestra at the height of a crescendo forte.

Jennings grabbed up the phone again.

"Transportation!" he shouted.

"Already dispatched, sir," the operator at the other end responded.

Through the periscope slit, Jennings watched the ship settle lightly downward to the ground, as though it were a breezeborne feather instead of its tons of metal. It seemed to settle itself, still, and become inanimate again. Major Eddy dropped his hands away from his instrument bank, an exhausted virtuoso.

"My congratulations!" the senator included all three men in his sweeping glance. "It was remarkable how you all had control at every instance. My progress report will certainly bear that notation."

The three men looked at him, and realized there was no irony in his words, no sarcasm, no realization at all of what had truly happened.

"I can see a va-a-ast fleet of no-o-ble ships . . ." the senator began to orate.

But the roar of the arriving jeep outside took his audience away from him. They made a dash for the bunker door, no longer interested in the senator and his progress report. It was the progress report as revealed by the instruments on the ship which interested them more.

The senator was close behind them as they piled out of the bunker door, and into the jeep, with Jennings unceremoniously pulling the driver from the wheel and taking his place.

Over the rough dirt road toward the launching site where the ship had come to rest, their minds were bemused and feverish, as they pro-

jected ahead, trying to read in advance what the instruments would reveal of that blank period.

The senator's mind projected even farther ahead to the fleet of space ships he would own and control. And he had been worried about some ignorant stupid voters! Stupid animals! How he despised them! What would he care about voters when he could be master of the spaceways to the stars?

Jennings swerved the jeep off the dirt road and took out across the hummocks of sagebrush to the ship a few rods away. He hardly slackened speed, and in a swirl of dust pulled up to the side of the ship. Before it had even stopped, the men were piling out of the jeep, running toward the side of the ship.

And stopped short.

UNABLE TO BELIEVE their eyes, to absorb the incredible, they stared at the swinging open door in the side of the ship. Slowly they realized the iridescent purple glow around the doorframe, the rotted metal, disintegrating and falling to the dirt below. The implications of the tampering with the door held them unmoving. Only the senator had not caught it yet. Slower than they, now he was chugging up to where they had stopped, an elephantine amble.

"Well, well, what's holding us up?" he panted irritably.

Cautiously then, Jennings moved toward the open door. And as cautiously, Major Eddy and Professor Stein followed him. O'Noonan hung behind, sensing the caution, but not knowing the reason behind it.

They entered the ship, wary of what might be lurking inside, what had burned open the door out there in space, what had been able to capture the ship, cut it off from its contact with controls, stop it in its headlong flight out into space, turn it, return it to their controls at precisely the same point and altitude. Wary, but they entered.

At first glance, nothing seemed disturbed. The bulkhead leading to the power plant was still whole. But farther down the passage, the door leading to the control room where the instruments were housed also swung open. It, too, showed the iridescent purple disintegration of its metal frame.

They hardly recognized the control room. They had known it intimately, had helped to build and fit it. They knew each weld, each nut and bolt.

"The instruments are gone," the professor gasped in awe.

It was true. As they crowded there in the doorway, they saw the gaping holes along the walls where the instruments had been inserted,

one by one, each to tell its own story of conditions in space.

The senator pushed himself into the room and looked about him. Even he could tell the room had been dismantled.

"What kind of sabotage is this?" he exclaimed, and turned in anger toward Jennings. No one answered him. Jennings did not even bother to meet the accusing eyes.

They walked down the narrow passage between the twisted frames where the instruments should have been. They came to the spot where the master integrator should have stood, the one which should have co-ordinated all the results of life-sustenance measurements, the one which was to give them their progress report.

There, too, was a gaping hole—but not without its message. Etched in the metal frame, in the same iridescent purple glow, were two words. Two enigmatic words to reverberate throughout the world, burned in by some watcher—some keeper—some warden.

"Not yet."

— THE END —

THE NEXT ISSUE will contain another exceptionally fine line-up of stories. In addition to *A CASE OF CONSCIENCE* by James Blish, you'll find *THY ROCKS AND RILLS* by Robert E. Gilbert. It's a vision of the Manly Age in Earth's not-too-distant future, complete with legal duels, destructive "thrill parties", subjugated women, and such pleasant diversions as bullfights—but what happens when an intelligent mutant bull enters the picture is moderately world-shaking. W. W. Skupeldyckle presents a new approach to science fiction in *THE ROMANTIC ANALOGUE*; James McKimmy, Jr., (*the* find of '53) tells about a *PLANET OF DREAMS*; and there will be top-notch stories by Jerome Bixby, Philip K. Dick, and others.

On earth and in space, Humanity was the beneficiary of Dornal's great experiments, for it supplied—

The GUINEA PIGS

By S. A. Lombino

AND WHICH two shall be the guinea pigs this time?" Kral asked, a touch of bitterness tinging his voice.

Dornal smiled a crooked smile, and stroked the carefully trimmed beard that clung to his fine jaw. His right eyebrow lifted ever so slightly, and his blue eyes twinkled with faint puzzlement.

"Surely you're not concerned?" he asked Kral.

"Excuse me," Kral said sarcastically, "I lost my head."

He turned on his heel, presenting the broad back of his yellow tunic to Dornal, strode rapidly toward the plasteel door at the far end of the chamber.

"Just a moment!" Dornal's voice cracked like a whip.

Kral turned to face his superior officer. "Yes?" he asked.

"I'm not sure I like your attitude," Dornal said. The smile had vanished from his lips. He stood now, tall, proud, regal. The blackness of his thick, flowing hair and

his short beard framed the perfect oval of his face. His brows were knitted in consternation, and the eyes that examined Kral were cold—and a little cruel.

Kral met Dornal's eyes with his own and slowly said, "And I'm not sure I like yours either."

Dornal's hand dropped automatically to the stun gun hanging in the plastic holster at his waist. He seemed to think better of it, looped his thumb into his belt instead. Again, he smiled charmingly, his teeth flashing in a white, even grin.

"Kral," he said, "don't be a fool."

"Damnit, I'm not being a fool!" Kral shouted. "I'm just getting fed up. God, how much longer is this going to go on, this indiscriminate use of human beings as—"

"You're upset," Dornal said, not unkindly. "Borrow a ship, take a hop to the Moon. It'll do you good. Spend a little . . ."

"I don't need a pleasure cruise

to the Moon. It'd only remind me of the guinea pigs who made that trip possible."

"All right then, Kral, what do you want?"

"I want to resign," Kral said evenly. "I want to resign from your service. You can get a new assistant. I want to leave your whole stinking government to you. You alone. I want you to handle all of your own rotten experiments. I want to . . ."

"That's enough!" Dornal's stun gun was in his hand now. With a quick motion of his other hand, Dornal flicked the potency lever on the gun. Kral knew it was up full now, and Dornal would shoot to kill.

"Go on," he said. "Squeeze the trigger."

"I hope you're not daring me, Kral." Dornal's voice was cold.

Kral suddenly spread his arms in despair. "Dornal, look, there are other ways. Man had other ways before you . . . before we began to tamper. Science was beginning to solve its own problems. It was just a matter of . . ."

"It was a matter of decadence," Dornal interrupted. "Before I became Chief, science was floundering about in its own offal. Who cured cancer? Who defeated polio? Who reached the Moon? And Mars? Venus? Who, Kral, who?"

"Do you think you did? Do you think for one minute it was you, Dornal?"

"Yes," Dornal answered proudly. "It was, Kral. It was I who made these things possible. Before me, there was stupidity and blind sentiment. They depended on volunteers, and when they had no

volunteers they had to fumble around with animals. By conscription of human beings these wonderful things have been made possible. Now, when we are on the verge of another great experiment, you show your chicken heart!"

"Another experiment that will kill more people," Kral added.

"Perhaps," Dornal admitted. "Perhaps. It doesn't matter. Perhaps they'll be successful the first time, and then no one would be lost."

Kral spat in disgust. "Did they cure cancer the first time? How many humans did you murder to discover the cause of cancer?"

"And how many did we *save* by discovering the cause and bringing about a cure?"

"Don't say 'we'; it was all your doing."

"On the contrary," Dornal said. "It was *our* doing."

"How many space ships did you send out into the blackness before we reached the Moon?" Kral persisted. "And then Mars and Venus? How many lives did you throw away?"

"I must remind you," Dornal said softly, "that I rule this universe. You are only my assistant, a position granted by my grace. I do what is best for the population."

"And I help," Kral said.

"Yes. You help."

"Who are you to say that so many people must die to make things easier for those who survive them? No one has that power, Dornal. No one but . . ."

"God," Dornal finished. "No one but God."

Kral's lips tightened across his

face. He turned to go.

"I wasn't aware I'd dismissed you," Dornal snapped.

Kral turned to face Dornal. "Sir?" he asked.

"The new ship leaves tomorrow at oh-two-hundred. I'll need only two men to man her. Good men, Kral. This isn't going to be the usual hop. We're reaching for the stars this time—we're going to explore a new universe. Once we break the chains that bind us to our own solar system, nothing can stop us. Nothing!"

"You'll have your two men, sir," Kral said. "Will that be all, sir?"

"Dismissed," Dornal said. He slipped his stun gun back into its holster as Kral opened the plasteel door and left the chamber.

THE ENORMOUS ship stood on spidery legs, nose pointed skyward. The sand spread out beneath it, bathed in the bluish light of the stars. Dornal glanced upwards, his eyes darting from one pinpoint of light to the next. The slow smile crossed his face again, and his fingers ran smoothly through his short, immaculate beard.

Impatiently, he glanced at his wrist-chron. The ship was set for blastoff at oh-two-hundred. It was now oh-one-fifty and there was still no sign of Kral.

From the control tower, a loud-speaker blared, "*Red minus five. Red minus five.*"

The ground car screeched onto the desert sand, and Kral stepped out, waiting for the two young men to follow him. Together, they took

long strides across the sand to where Dornal was standing.

"I knew you wouldn't fail me," he said to Kral.

"Two more or less," Kral shrugged. "What's the difference now?"

"Exactly," Dornal agreed. "Two more or less."

"*Red minus three,*" the speaker blared. "*Red minus three.*"

"We'd better get aboard and show the men the ship, sir," Kral said. "They'll be blasting off in eight minutes."

"Yes, yes," Dornal said. He glanced upwards at the stars as he mounted the ladder to the nose turret. Kral followed Dornal, but not too closely. Behind him were the two chosen men. They were strangely silent, a little pale.

"*Red minus one,*" the speaker announced.

With a powerful backward thrust, Kral kicked the man behind him. There was a short grunt of surprise, as the first man tumbled backwards, down the ladder, carrying the second man with him. They rolled over in the sand as Kral raced up the remaining rungs and into the turret.

"*Red condition,*" the speaker warned. "*Green minus five.*"

Kral snapped the hatch shut and twisted the lock wheel. Dornal was peering up out of the blister, his back to Kral. "Soon it will all be mine," he said, scanning the universe.

"Yes," Kral agreed.

Somewhere below, the powerful turbo-jets hummed into action, building power. The sound jostled Dornal. He turned to face Kral.

"*Green minus three*," the speaker announced.

Kral felt the ship tremble with the increasing power of the jets. In less than three minutes, the ship would be hurled into space, hurled into unknown universes. A look of surprise crossed Dornal's face as he stared around the cabin. "Where are the pilots? What's . . . ?"

He noticed the strained look on Kral's face then.

"*Green minus two. Standby for blastoff.*"

"What are you . . . ?"

"What's two more or less?" Kral

shouted. Dornal reached for the space lock, fear marking his face.

The desert sands began to glow red and yellow as the jets spewed flame into the darkness.

"*Green minus one.*"

Dornal clawed at the lock wheel frantically. Kral smashed his fist into Dornal's hysterical features, and the other man crumpled to the deck.

In another second, the force of acceleration threw Kral down unconscious beside the other man. Silently, the ship streaked for the stars.

THE END

IRRESISTIBLE WEAPON

(Continued from page 31)

accuracy, the colonel put the ship into subspace drive.

Korman leaned back at the conclusion of the brief activity on his control board, and met Gibson's pop-eyed stare.

"Interesting, the things worth knowing," he commented. "How to make a weapon, for instance, or whether your enemy has it yet."

He almost smiled at his prisoner's expression.

"Or even better: knowing exactly how far your enemy has progressed and how fast he can continue, whether to stop him immediately or whether you can remain a step ahead."

"B-but—if both sides are irresistible . . ." Gibson stammered.

Korman examined him contemptuously.

"No irresistible weapon exists, or ever will!" he declared. "Only an irresistible *process*—the transmission of secrets! You are living proof that no safeguards can defend against *that*."

He savored Gibson's silent discomfort.

"I am sure you know how far and how fast the Centaurian scientists will go, Gibson, since I guided you to every laboratory in that plant. Your memory may require some painful jogging when we reach the Solar System; *but remember you shall!*"

"But you—you were ordered to . . ."

"You didn't think I was a Centaurian, did you?" sneered Korman. "After I just explained to you *what* is really irresistible?"

THE END

THE *Postman* COMETH

TO BE OR NOT TO BE

Dear Friends:

I was introduced to IF with the January 1953 issue and was very pleasantly surprised. I am tempted to give IF the edge over ASTOUNDING for the highest level of intelligence in the science fiction field, but you realize how unfair this would be to John Campbell and/or the publishers of ASTOUNDING, inasmuch as my judgment would be based on only one issue of IF. I must read at least 60 or 70 issues of IF, before I come to so momentous a decision. Well, at least two or three issues, anyway.

My favorite story in the January issue was Walter Miller's CHECK AND CHECKMATE. Not only was it a good story with an unusual twist, but I think it took courage to write and courage to publish it. I admire and respect all concerned for it.

I also liked Rog Phillips' YE OF LITTLE FAITH, but was left somewhat baffled as to what Rog was trying to tell. Is he "fer or agin" belief (faith)? The title and

the structure of the story seem to imply that he's "fer," but I got the distinct impression that he is a whopping logician with his tongue in his cheek.

Although Rog does not elaborate on Martin Grant's theory, I think I know *one* answer (and I imagine there is room for more) to the enigmatic disappearances. To me, it is a very "obvious further step" in logic, as Rog makes Grant suspect there "must" be.

Martin Grant's theory "contains within itself the proof that the universe must, by logical necessity, be constructed according to said theory. But observation and experience say this is not true." Martin Grant conjectures, "Either the universe is not constructed according to logical necessity, or, the observable universe is not the universe."

Now, assuming that Grant's theory was that the universe is *an illusion*, it follows (if I accept this theory) that MY OWN EXISTENCE is *part of that very same illusion!* Illusion and existence become synonymous. The moment "I" become "aware" of this "fact," pop goes the illusion AND, therefore, my existence. The "logical necessity" is, logically, the *simultaneity* of the illusion-existence of universe and self. To be or not to be applies to the sum total. It is indivisible. Simple.

Grant's statement, "observation and experience says this is not true" was correct *prior* to his own disappearance, but to him alone. It remained correct to each individual *only to the point of the individual's*

disappearance. Naturally, Grant's conjectures are meaningless.

—George Fedak
Uniondale, N. Y.

We like you, Mr. Fedak, and want you to read at least 60 or 70 issues of IF. Please don't get too involved in this puzzle and disappear yourself!

THE PLANETS, YES

Dear Editor:

You state that space travel will not appear before the year 2000. That's all well and good, but then you go on to say that man has to have the driving force of animal survival before he leaves the earth. You then state that there is still millions of inhabitable miles before the earth will be overcrowded. By your own reasoning you seem to think the only motivation for man to leave earth, is that of his own survival. You are absolutely wrong.

An overcrowded America was not the reason that explorers went into the deepest parts of Africa, into the unexplored sections of the Amazon, into forbidden Tibet.

The three basic motives that will make man venture into space are Adventure, Curiosity and a Challenge. Adventure and Curiosity are self explanatory. I'll explain the third and most important motive, a Challenge.

The challenge of going where no other human has ever been before, the challenge of standing on an alien planet where no other human foot has ever trod, the chal-

lenge of meeting and establishing contact with alien life forms, these challenges and many more will drive man on to the planets and finally to the stars.

Adventure, Curiosity, and the Challenge will send man out into space, not survival.

—Lyle Kessler
Philadelphia, Pa.

A nice, idealistic concept—and the sort of idea that makes science fiction possible, for which we're thankful! But some challenges do go unanswered. Africa, the Amazon, Tibet presented purely practical motives too, and besides could be attacked by individuals; space is going to take organization and an awful lot of money. But we'll make it yet!

LOST: FIVE YEARS

Dear Mr. Quinn:

YE OF LITTLE FAITH by Rog Phillips was tops.

However, his factual research was lacking. On page 50, Rog (Curt) states, "Your father can't be declared legally, ah, departed for two years." (The underscore is mine.) Being an ex-insurance man for many long years, indirectly connected with legal adjustments and actuarial departments, I am positive that vanished persons are not declared legally dead until seven years have passed.

This factual error might detract reader interest with many fantasy fans and this, I know, Rog Phillips would not want done.

—Elmer R. Kirk



VENUS is covered by a heavy blanket of clouds which obscures the planet's surface, making conditions there a matter for speculation. No water vapor or oxygen can be detected in Venus' atmosphere, but there is an abundance of carbon dioxide. The spaceship shown is traveling in a power-off attitude, but will make a tail-first landing under power—if it finds anything to land on!

(Drawings by Ed Valigursky)

